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Investigation into the conditions and circumstances resulting in the tragic death of Dag Hammarskjöld and of the members of the party accompanying him

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Note by the Secretary-General

1. Pursuant to paragraph 3 of General Assembly resolution 1759 (XVII), I have the duty to inform you that new evidence has come to my attention relating to the conditions and circumstances resulting in the tragic death of Dag Hammarskjöld and of the members of the party accompanying him.

2. In July 2012, an enabling committee chaired by Lord Lea of Crondall, and consisting of the former Secretary-General of the Commonwealth, Emeka Anyaoku, and the Archbishop Emeritus of the Church of Sweden, K. G. Hammar, set up the Commission of Jurists on the Inquiry into the Death of Dag Hammarskjöld (hereinafter, the "Hammarskjöld Commission") chaired by Sir Stephen Sedley (United Kingdom of Great Britain and Northern Ireland) and composed also of Ambassador Hans Corell (Sweden), Justice Richard Goldstone (South Africa) and Justice Wilhelmina Thomassen (Netherlands).

3. I have the honour to attach, as an annex to the present letter, a copy of the report of the Hammarskjöld Commission, which was made public on 9 September 2013 and formally presented to me shortly thereafter. In successive submissions between 27 September and 20 December 2013, the Hammarskjöld Commission also made available the information it had relied on in its report. It is my assessment that the documentation presented by the Hammarskjöld Commission includes new evidence.

4. In this connection, it also appears that additional new evidence may exist which, for national security reasons, was and remains classified by several Governments more than 50 years after the fact. I trust that the General Assembly may wish to encourage Member States, in the light of the passage of time, to seek to declassify any relevant records in their possession in accordance with their respective national legislation.

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5. Given the open verdict of the 1961-1962 United Nations Inquiry and given the possibility that the new evidence already in the possession of the Secretary-General may lead to a conclusive finding about the current theories of the causes of the crash of the former Secretary-General's plane, the General Assembly may wish to consider the following options:

(a) To establish an independent panel of experts, including forensic and ballistics experts, to examine the new evidence, to assess its probative value and to make recommendations to the General Assembly;

(b) To reopen the 1961-1962 Inquiry; or

(c) To establish a new inquiry.

6. The unparalleled service and sacrifice of Dag Hammarskjöld and his legacy within the United Nations and beyond compels us to seek the whole truth of the circumstances leading to his tragic death and that of the members of the party accompanying him.

Annex

Report of the Commission of Inquiry

on whether the evidence now available would justify the United Nations in reopening its inquiry into the death of Secretary-General Dag Hammarskjöld, pursuant to General Assembly resolution 1759 (XVII) of 26 October 1962*

Contents

		Page
1.	The Commission and the Trust	4
2.	The Commission's objects and method of work	5
3.	The geopolitical situation in 1961	7
4.	The United Nations and Katanga	9
5.	The Secretary-General's intervention	10
6.	Arrivals at Ndola	12
7.	The crash	13
8.	Dag Hammarskjöld's death	16
9.	The previous inquiries	19
10.	The Commission's approach	21
11.	The external cause hypotheses	24
12.	Sabotage?	26
13.	Aerial attack or threat?	33
14.	Official collusion?	43
15.	Conclusions	47
	APPENDIX 1. The Commissioners	52
	APPENDIX 2. The Trustees	53
	APPENDIX 3. The experts	55
	APPENDIX 4. New witnesses	57
	APPENDIX 5. Select bibliography	58
	APPENDIX 6. Note on time zones	61

* Issued without formal editing.

1. The Commission and the Trust

1.1 On the night of 17-18 September 1961 a Swedish aircraft carrying sixteen people, one of them the Secretary-General of the United Nations, Dag Hammarskjöld, crashed near Ndola in what was then Northern Rhodesia and is now Zambia. All those aboard the aircraft died. A civil aviation inquiry, held immediately after the event, was unable to ascribe a cause to the crash; a Rhodesian commission of inquiry in February 1962 attributed it to pilot error; the United Nations' own commission of inquiry in April 1962, like the Rhodesian civil aviation investigation, found itself unable to determine the cause of the crash.

1.2 The UN inquiry's report was presented to the General Assembly, which by resolution 1759 (XVII) of 26 October 1962 requested the Secretary-General to inform the General Assembly of any new evidence relating to the disaster.

1.3 In the course of the intervening years a number of books, reports and papers have been published concerning the background, circumstances and cause of the crash. In 2011, the year of the fiftieth anniversary of the crash, Dr Susan Williams' book *Who Killed Hammarskjöld?* was published. It offered no definite answer to its own question, but it marshalled a striking quantity of evidential material which had come to light in the intervening years.

1.4 In response to Dr Williams' book, Lord Lea of Crondall assembled an international Enabling Committee and invited Sir Stephen Sedley, a recently retired Lord Justice of Appeal for England and Wales, to chair a commission of jurists to inquire into the disaster. Justice Wilhelmina Thomassen of the Netherlands, Justice Richard Goldstone of South Africa and Ambassador Hans Corell of Sweden agreed to serve with Sir Stephen as Commissioners. Their biographical data are set out in **Appendix 1**. All have worked without remuneration. This is their report.

1.5 The Commission's agreed remit has been to report on whether the evidence now available would justify the United Nations General Assembly in reopening the inquiry which, in substance, it had adjourned by its resolution of 26 October 1962. The Commission has not sought itself to determine the cause or causes of the crash.

1.6 The Enabling Committee has formed a Trust with the principal purpose of sponsoring the Commission's inquiry. The trustees, who are listed in **Appendix 2**, have made and raised donations to cover the Commission's expenses. They have themselves worked without remuneration. The mutual understanding has been that the Trust would facilitate the Commission's work, and that the Commission would function entirely independently of the Trust and would reach its own conclusions.

1.7 A leading London firm of solicitors, Field Fisher Waterhouse, have donated their services as solicitors to the Commission. Their advice and assistance on a variety of legal and logistical matters have been invaluable.

1.8 The Commission is indebted to Heather Rogers QC and Ben Silverstone of Doughty Street Chambers, London, for specialist legal advice furnished *pro bono publico* through Field Fisher Waterhouse to the Commission.

1.9 The Commission is also indebted to a number of leading technical and medical experts, listed in **Appendix 3**, who have donated their time and knowledge to enable the Commission to reach informed views on scientific and technical issues.

1.10 The linchpin of the Commission's work has been the provision by the Trust of a salaried secretary, Bea Randall BSc, MSc, without whom we could not have functioned and who has worked far beyond the call of duty. It is to her that the acquisition, organisation and storage of our evidence, and much else besides, is owed.

1.11 We have had invaluable voluntary assistance from other sources. Sepideh Golzari LLB, LLM, has made spreadsheet analyses of the evidential material now available to the Commission, facilitating cross-reference and ensuring comprehensiveness. She has also prepared the table in Appendix 6. Research in the United States has been conducted on the Commission's behalf, again voluntarily, by Thomas John Foley BA, JD.

1.12 At the University of Leiden, a team of student volunteers (Annelore Beukema, Thijs Beumers, Kitty ten Bras, Martijn Hekkenberg, Abram Klop and Danielle Troost) under the supervision of Professor Dr Alex Geert Castermans has made an exhaustive comparison of the testimony given to the three formal inquiries mentioned in section 1.1 above, making it possible to see at a glance how the available evidence was dealt with at the time.

1.13 We treat these sets of tables, which will be accessible through the Commission's website, as tertiary evidence, and we record our gratitude to their respective authors.

2. The Commission's objects and method of work

2.1 It is legitimate to ask whether an inquiry such as this, a full half-century after the events with which it is concerned, can achieve anything except possibly to feed speculation and conspiracy theories surrounding the crash. Our answer, and the reason why we have been willing to give our time and effort to the task, is first that knowledge is always better than ignorance, and secondly that the passage of time, far from obscuring facts, can sometimes bring them to light. We hope that what follows in this report justifies our initial view that our inquiry, with its deliberately restricted remit, might help to cast some new light on a major event in modern world history. The truth, insofar as it can be ascertained, also still matters to the families of those who were killed, not least among them the crew who were blamed by the Rhodesian inquiry for the disaster.

2.2 Having no formal legal status, the Commission has solicited and received evidence without any power of compulsion. This has not only enabled it to function with a minimum of formality: it has had little or no adverse impact on the acquisition of evidence; if anything, the reverse. There has been the occasional attempt to bargain with us, but no deal of any kind has been struck in return for evidence. We record our appreciation of the living witnesses, listed in **Appendix 4**, who have voluntarily given us their testimony. This will remain on record for any future investigation.

2.3 Because the Commission's remit does not extend to making definitive findings, and equally because of the passage of time, on-the-spot investigation has not been the basis of our work. But it was considered essential that at least two Commissioners should visit Ndola, in what is now Zambia. Justice Goldstone and the Chairman made this visit in May 2013. They were able to interview a number of

local witnesses who had not been called to give evidence to any of the three official inquiries, and to examine both the crash site and the airfield and control tower at Ndola (the latter having begun operating the April before the crash).

2.4 In addition to interviewing living witnesses using audio recording and transcription, or obtaining their evidence in writing, the Commission has assembled all available records of testimony about the circumstances of the crash.

2.5 With the help of official archivists, to whom it records its gratitude, the Commission has carried out a series of archival searches in Belgium, Sweden, the United Kingdom and the United States of America. So far as they have advanced our inquiry, these sources are described in the text of this report. Even at this distance of time, however, a limited number of archives have remained closed to us. Among these is the archive of the Belgian airline Sabena which is now in liquidation (although the liquidator has found nothing in the inventory which he believes to be relevant). The Swedish National Archive, which has been conservative in the use of its statutory powers of disclosure, might have been able to give greater assistance to the work of the Commission's pathologists (see section 8.9 below). As will become apparent later in this report, there appear also to be relevant but classified records held by the US National Security Agency.

2.6 One significant development in the course of our work was the opening at the National Archives of the UK in April 2013 of the Northern Rhodesian files in what is known as the 'migrated archives': that is to say, the files of the former British colonial administrations that were sent to the UK immediately prior to the transfers of power at the time of decolonisation, and which are only now being progressively released. These are drawn on in the course of this report.

2.7 To take a single example of how newly available documentation and testimony have nevertheless come to inform our work, the contents of sections 5.7-8 below concerning the planned rendezvous at Ndola between Dag Hammarskjöld and Moise Tshombe draws substantially on a secret report of Neil Ritchie, an MI6 operative posted as first secretary to the British High Commission in Salisbury, which is now archived with Lord Alport's papers at Essex University; an unpublished typescript memoir provided to us by its author, Denzil Dunnett, who in 1961 was the British consul in Katanga; and a recorded interview given to the Commission by Sir Brian Unwin, a British diplomat who was present at Ndola as the private secretary to the British High Commissioner in Rhodesia, Lord Alport.

2.8 As will also become apparent in the course of this report, a significant proportion of the eyewitness testimony to which we refer was either not available to the UN Commission in 1961-2 or was seemingly overlooked by it.

2.9 We have chosen not to burden the text of this report with footnotes or a full bibliography. A select bibliography taken from the literature mentioned in section 1.3 above is contained in **Appendix 5**. It is the Commission's intention, shared by the Trust, that all its evidential material, whether primary, secondary or tertiary, will be made electronically accessible, making it possible to find the source of everything in this report.

2.10 In order to avoid confusion, all times have been transposed into Ndola local time. To help those who wish to consult our source materials, **Appendix 6** sets out in tabular form what we understand to have been the relationship between the relevant time zones on 17-18 September 1961.

2.11 There are two significant individuals still living whom we have not sought to interview: Dag Hammarskjöld's biographer Sir Brian Urquhart, and Bengt Rösiö, formerly Swedish consul in the Congo, who was asked by the Swedish government in 1993 to report on the crash, and who has expressed further views since then. No disrespect has been intended to either of these commentators, whose views about the cause of the crash are publicly known; but it did not appear to us consistent with our task of forming an independent view to involve them in our deliberations.

2.12 A major element in the material available to us has been Susan Williams' book *Who Killed Hammarskjöld?*. Since Dr Williams has also served as a trustee, we should make it clear that her input has been treated like all other inputs — as material which it is for the Commission to evaluate. The same is true of the extensive research of another trustee, Hans Kristian Simensen, which has been made freely available to us. It will also be observed that those submitting either analytical or expert evidence to the Commission have in places volunteered their own views on questions within the Commission's remit. The Commission, while noting these views, has been careful not to treat them as substitutes for its own judgment.

2.13 Finally it is necessary to stress that this report (in contrast to our database) makes no claim to comprehensiveness. To achieve this would have required a text of Tolstoyan length and Proustian complexity. It would also have meant abandoning our time-line — to report by September 2013 — in favour of an indefinite period of investigation. What we have done in the course of some twelve months is to read and consider everything capable of being relevant to our remit; to frame working hypotheses capable of explaining what is now known; to organise our analysis of the material now available in relation to these hypotheses; and to reach a reasoned conclusion on the question with which we began: would the United Nations General Assembly be justified in resuming its own inquiry?

3. The geopolitical situation in 1961

3.1 The process of African decolonisation had reached a critical stage by 1961. The pressure on the principal European colonial powers, the United Kingdom, France, Portugal and Belgium, to cede independence to their colonies was coming not only from the indigenous liberation movements but from the United Nations, neither of whose two dominant members, the US and the USSR, supported European colonialism, and for whom the withdrawal of the European colonial powers would open up new markets and new theatres of influence. The surviving white minority regimes of the Rhodesian Federation and South Africa, by contrast, had everything to fear from the process.

3.2 On 30 June 1960 Belgium surrendered its sovereignty over the Congo, and elections brought to power as prime minister a nationalist politician, Patrice Lumumba. In the hope of preserving national unity, Lumumba nominated his rival Joseph Kasavubu as president; but within days the Congolese army had mutinied. The consequent large-scale exodus of Belgian settlers prompted Belgium to intervene militarily. On 11 July 1960 the Katangan politician Moise Tshombe, with the overt support of the Belgian military command, declared the province of Katanga an independent state.

3.3 Katanga contained the majority of the Congo's known mineral resources. These included the world's richest uranium and four fifths of the West's cobalt

supply. Katanga's minerals were mined principally by a Belgian company, the Union Minière du Haut Katanga, which immediately recognised and began paying royalties to the secessionist government in Elisabethville. One result of this was that Moise Tshombe's regime was well funded. Another was that, so long as Katanga remained independent of the Congo, there was no risk that the assets of Union Minière would be expropriated.

3.4 The United States, for its part, needed to balance its support for decolonisation with its fear that Congo's resources, in particular its uranium, would fall into Soviet hands if a nationalist government took control. In August 1960 Lumumba, now desperate for help, accepted Soviet technical aid. In September 1960 President Kasavubu dissolved the Congolese parliament and an army colonel, Joseph Mobutu, seized power. In January 1961 Lumumba and two other leading Congolese politicians were kidnapped by Mobutu's troops, allegedly with the connivance of the Belgian, British and US security services, and were taken to Katanga, where they were tortured and murdered.

3.5 To the south-east of Congo lay the British colony of Northern Rhodesia, part of the Rhodesian Federation, a political union of Northern Rhodesia, Southern Rhodesia and Nyasaland, created by Britain in 1953 with the aim of preserving white minority rule. Constitutionally the Federation was a British dependency, which made the UK responsible for its foreign relations. Its prime minister, Sir Roy Welensky, a heavyweight politician in every sense, was acutely conscious of the implications of having on its frontiers indigenous regimes supported by the USSR. While for the settler populations the frontier with Katanga remained porous, allowing free intercourse between the principal Copperbelt town, Ndola, and the Katangan capital, Elisabethville, the Federation's strategic priority was to ensure that political emancipation and majority rule did not spread to the Federation from the Congo. To that end, it sought to ensure that an unthreatening régime held power in Katanga, forming what Welensky described as a buffer against pan-Africanism. The Federation accordingly welcomed Tshombe's seizure of power. Welensky's animosity towards the United Nations and its policies and activities in central Africa was correspondingly strong. A message sent by him on 21 April 1961 to Lord Home, then the British foreign secretary, and classified secret, fiercely opposed the UN's efforts to end the Katanga secession:

> "It passes my understanding how the United Kingdom and United States Governments can sit back and watch this tragedy unfolding without apparently lifting a finger to stave off the final slaughter of all the heroes in it.
>
> .....
>
> ....Tshombe is a very good friend of the Federation. His regime is based on the high ideals of race partnership for which we stand....
>
> .....
>
> The final irony in the Congo is that America foots the bill!"

A telegram to Lord Alport sent on 6 September 1961 records a message from Welensky demanding that the UK should "publicly repudiate U.N. actions" and warning that he might move Federal troops up to the Congolese border.

3.6 While the UK and Belgium, although both members of the UN, had no formal alliance at state level, there were strong commercial links between them and with

US and South African interests. Union Minière had close relations with the British company Tanganyika Concessions (known as Tanks): the chairman of Tanks, Captain Charles Waterhouse, was also a director of Union Minière. Tanks in turn had links with Anglo-American, the Rhodesian Selection Trust and the British South Africa Company. In addition to their shared concern that an independent African state might expropriate foreign commercial holdings, as Egypt had done in 1956, South Africa feared that its system of apartheid, which was in large part operative in Rhodesia, would succumb to a domino effect as national liberation moved southward.

3.7 The role of the United Kingdom, as the colonial power responsible for the Federation, was complex. There is a good deal of evidence of a divide between London and Salisbury (now Harare, then the capital of the Federation) in relation to the UN's presence in the Congo. The Under-Secretary of State for Foreign Affairs, Lord Lansdowne, was seeking to implement Whitehall's policy of support for the UN's effort to achieve a ceasefire and in due course to bring Katanga back into the Congolese state. By contrast, the British High Commissioner to the Rhodesian Federation, Lord Alport, who can now be seen from his archived papers to have been a strong supporter of the Federation's supremacist policies, conducted himself on the night of the crash with an unconcern about the disappearance of the Secretary-General's aircraft to which we shall have to return. The week after the crash he sent a dispatch to London blaming the UN's "complete failure to understand the conditions in Central Africa" for the disaster, adding that these were "better left to Europeans with experience of that part of the world".

3.8 The ambivalence of the UK's position was described to us in this way by Alport's then private secretary, Sir Brian Unwin:

> "The United States were very strongly backing the United Nations. Although we were in principle aligned with the United States, I think the British government were very much more concerned about the actions of the United Nations, and we made more representations in New York."

3.9 There is evidence, however, both within and outside the Commission's documentation, of a cleft in policy between the US Administration and the US Central Intelligence Agency. While the policy of the Administration was to support the UN, the CIA may have been providing materiel to Katanga: see for instance section 13.17 below.

3.10 The foregoing paragraphs make no attempt at comprehensiveness. They are intended to do no more than indicate why it was that, by September 1961, a number of states, or state agencies, and major commercial enterprises had a stake in the secession of Katanga. In short, Belgium, the British and American security services, the Rhodesian Federation (together with its British supporters) and the Republic of South Africa had reasons not to welcome the prospect of a reunited and independent Congo which it was the UN's policy and Dag Hammarskjöld's mission to bring about, and which both the UK government and the US administration supported.

4. The United Nations and Katanga

4.1 On 21 February 1961 the Security Council, by resolution 161 (1961), resolved that "measures be taken for the immediate withdrawal and evacuation from the

Congo of all Belgian and other foreign military and paramilitary personnel and political advisers not under the United Nations Command, and mercenaries". Equipped with this authority, ONUC (the *Organisation des Nations Unies au Congo*) augmented its military presence in the Congo: by March 1961 its multinational force under the command of the Irish general Sean McKeown was 15,000-strong.

4.2 The resources at Katanga's disposal included at least one and possibly several Fouga Magister jet fighters and several mercenaries capable of flying them. Armed with two machine guns, and capable of delivering small bombs, one of them had on several occasions harassed UN transport planes on the ground. As will be seen, the availability of a second Fouga may be a material issue. Evidence that Katanga in September 1961 possessed more than one combat-ready Fouga comes from two "inside" sources. One is the former mercenary Jerry Puren, who in his memoir *Mercenary Commander* asserts that ONUC operations had left Katanga with "two Fouga Magister jet trainers" and a few other aircraft. The other is the evidence of David Doyle, the former CIA officer in Elisabethville, that he had witnessed three of these planes being clandestinely delivered to Katanga: see sections 13.17-18 below.

4.3 The activity of the ONUC forces in the Congo in the course of 1961 is factually complex and historically and politically controversial. Political command on behalf of the UN was exercised, not always to universal acclaim, by the Irish diplomat Conor Cruise O'Brien. It is sufficient for our present purpose to record that O'Brien made it his priority to force Tshombe to expel the mercenaries from his military apparatus and to acknowledge the authority of the Congolese government in Leopoldville. Tshombe's refusal prompted ONUC's Operation Rumpunch which, despite ONUC's considerable inferiority in weaponry and airpower, succeeded in the course of 28 August 1961 in capturing a number of strategic points in Elisabethville. At this point Britain, Belgium and France intervened diplomatically and took responsibility for deporting those mercenaries whom ONUC had captured. But the Katangan secession showed no sign of collapse or compromise, and at least 100 mercenaries remained unaccounted for.

4.4 ONUC consequently initiated Operation Morthor, designed to effect seizure of key buildings in Elisabethville and facilitate the arrest of Tshombe and four of his ministers on charges of torture and murder. The operation was launched on 13 September 1961 but ran into greater resistance than Rumpunch had done. Seeing itself at risk of becoming a belligerent party in a civil war, ONUC put out feelers for a ceasefire. It was in the course of his attempt to carry through the consequent negotiations that the Secretary-General lost his life.

5. The Secretary-General's intervention

5.1 Dag Hammarskjöld and his team arrived in Leopoldville from New York on 13 September 1961. His mission was to discuss an aid programme with the Congolese government, but he arrived on the day that, without his knowledge or approval, Operation Morthor was launched, and was forced to turn his attention to the resultant crisis. An endeavour by the British consulate in Elisabethville to broker ceasefire talks between Tshombe and O'Brien had stalled over O'Brien's requirement that Tshombe must first recognise the unity of the Congo and the

authority of its central government. Tshombe was refusing to meet O'Brien and wanted to negotiate with the Secretary-General.

5.2 On Saturday 16 September, with the fighting unabated, Hammarskjöld sent Tshombe a proposal that they should meet in Rhodesia. Through the British consul in Katanga, Denzil Dunnett, Tshombe agreed to meet and proposed Bancroft in Northern Rhodesia as the venue. Hammarskjöld responded that there must first be a ceasefire and, in view of the poor landing facilities at Bancroft, proposed that they should meet at Ndola. Through Dunnett, Tshombe agreed to both conditions but sought to add others of his own. When Hammarskjöld tried to send a rejection of these added conditions, however, Dunnett informed him that Tshombe was about to leave by air for Ndola.

5.3 On Sunday 17 September, Neil Ritchie, an MI6 officer and first secretary at the High Commission in Salisbury, went with two small aircraft to collect Tshombe and Dunnett for the journey to Ndola. He found them in Kipushi in the company of Henry Fortemps, the assistant director general of Union Minière in Elisabethville. Tshombe, with probably three of his ministers, reached Ndola at about 1700 local time. At Ndola his party waited in a small room at the airport for the arrival of Lord Lansdowne and of the Secretary-General from Leopoldville.

5.4 At 1751 hours, Dag Hammarskjöld's aircraft, a chartered DC6 registered as SE-BDY and known to its crew as *Albertina*, took off from Ndjili airport, Leopoldville, for Ndola.

5.5 Lord Lansdowne's plane arrived at Ndola at about 2230 from Leopoldville, where he had taken the opportunity of an official visit to hold talks with Dag Hammarskjöld. At his own suggestion he was now flying to Ndola to facilitate the ceasefire talks; but at the Secretary-General's suggestion — made for what Lansdowne was later to describe as 'political reasons' — he was flying separately from and ahead of the UN party. We should say at once that we find nothing suspicious in this, and no reason to doubt that the suggestion came from Hammarskjöld: it was diplomatically and politically appropriate.

5.6 In the absence of any news of Hammarskjöld's arrival, Tshombe was taken to the senior provincial commissioner's house to wait. His wife and three children, who were already in Northern Rhodesia, were brought to join him next morning.

5.7 By midnight on 17 September the following, among others and in addition to Tshombe's party, were present at Ndola airport: the British High Commissioner, Lord Alport; his private secretary, Brian Unwin; officials of the Rhodesian high and regional commissions; the British consul in Katanga, Denzil Dunnett (together with his wife and children, who were en route to London); the British Under-Secretary of State, Lord Lansdowne, and his private secretary, Michael Wilford. Also present were the airport manager, John 'Red' Williams; a large group of Africans who were waiting to welcome the Secretary-General and were held outside the airport perimeter; and a considerable number of journalists.

5.8 In addition, at least according to the memoirs of a South African mercenary commander, Jerry Puren, he and two other mercenaries were present at the airport, and two more were 'in town'. The apparent presence of veteran mercenaries at Ndola, some of them at the airport, which has never been explained save (by Puren) as a coincidence, needs to be seen in the light of evidence given in 2013 to the Commission by a former assistant police inspector, Adrian Begg, that he had been

on duty that evening in order "to ensure nobody was at the airport who had no good reason to be there". He could not recall having to remove anybody. Whether these men were present because they had got wind that something was going to happen that night remains a matter of speculation.

5.9 Because of the risk of harassment by Katangan military aircraft, the Secretary-General had asked other states for air cover. Ethiopia had agreed to provide jet fighters, but by the date of the flight to Ndola the UK government had failed to grant the necessary clearance for overflying British East African territory. Although it has been suggested that this failure was deliberate, the Commission has found no convincing evidence that it was due to more than the want in London of any sense of urgency about dealing with the request.

6. Arrivals at Ndola

6.1 The *Albertina*, on charter from the Swedish company Transair and assigned to the UN Force Commander, was crewed by Captain Per Hallonquist as pilot in command, Captain Nils-Erik Åhréus and Second Pilot Lars Litton.[1] Radio silence was maintained in order not to expose the aircraft to Katangan attack, but communication in Swedish was arranged in case of emergency, using one Swedish operator (Karl Erik Rosén) in the aircraft and another on the ground at Leopoldville. Nothing was heard at any stage by the ONUC communications officer at Leopoldville, who was keeping a listening watch on the plane's radio frequency. To increase security yet further, Captain Hallonquist filed a flight plan naming Luluabourg as his destination. Shortly before take-off he told an ONUC colleague that his actual destination was Ndola. He explained that he would be setting course for the radio beacon at Luluabourg but from there on would have to navigate himself. Hallonquist was an expert navigator who taught navigation for Transair. We will come separately to the security of the aircraft itself.

6.2 The aircraft took a deliberately circuitous route in order to avoid interception by Katangan fighters. It flew east from Leopoldville towards Lake Tanganyika, then south along the Congolese border towards Ndola. Nothing was heard by ground control until at 2202 the aircraft called Salisbury to ask about the estimated time of arrival of Lord Lansdowne's plane, identifying itself as a DC6 bound from Leopoldville to Ndola and giving its own estimated time of arrival as 0035. It was told that Lansdowne was due at about 2217. At 2235, which coincided with Lansdowne's actual time of arrival, the aircraft gave its position as over the southern end of Lake Tanganyika. It would appear that from here the aircraft approached Ndola from the east or south-east. It was cleared to descend from 17,500 to 16,000 feet, which it reported completing at 2315. It reported its intention to land at Ndola and to take off again promptly for a destination which it could not yet give but which would not be Leopoldville. At 2332 Salisbury handed over radio contact to Ndola air traffic control.

[1] Out of respect we record the remaining names: Alice Lalande (secretary), Heinrich Wieschhoff (Africa specialist), Vlaimir Fabry (legal adviser), Bill Ranallo (bodyguard), Harold Julien (acting ONUC chief security officer), Serge Barrau, Francis Eivers, Stig Olof Hjelte and Per Edvald Persson (UN guards), Nils Göran Wilhelmsson (flight engineer) and Harald Noork (purser).

6.3 The aircraft called Ndola at 2335 with the estimate that it would be abeam the airstrip at 2347 and would arrive at 0020. Ndola tower replied with weather and barometric data. At 2357 the aircraft acknowledged the transmission and requested clearance to descend. This was given, with a request to report "top of descent", followed by dialogue about the aircraft's intentions after landing. Then at 0010 the aircraft reported: "Your lights in sight, overhead Ndola, descending, confirm QNH" Ndola replied: "Roger QNH 1021mb, report reaching 6000 feet." SE-BDY replied: "Roger 1021." The rest was silence: SE-BDY never landed at Ndola.

6.4 The foregoing account of ground communications with SE-BDY is taken from what appears to be the sole extant record, a log composed 32 hours in arrear from manuscript notes made by the senior Ndola air traffic controller, Arundel Campbell Martin, in the absence of the requisite audio recording. We shall return to the question of its authenticity and dependability, but we set it out here because, for reasons we shall give, we consider that any future inquiry is likely to consider it a reasonably dependable account — so far as it goes. In the light of sections 13.5 *et seq.* below, the latter qualification may be critical.

6.5 The materiality of the air pressure reading signified by 'QNH' is that it enables the crew to recalibrate the plane's altimeters to show barometric pressure adjusted to sea level. Although it has been suggested that a false QNH was given to the *Albertina* on its approach to Ndola, all three altimeters were found after the crash to be correctly calibrated. The suggestion that deliberately induced altimeter error caused the crash is considered in sections 10.3-4 below.

7. The crash

7.1 We shall also return separately (see section 14 below) to the contentious question of when the wreck of the aircraft was first located. For the present we record that it had crashed in a forested area, about 9 miles to the west of Ndola airport, at an altitude of 4,285 feet above sea level and 160 feet above the level of the airport. The trees first struck by the plane stood about 70 feet high.

7.2 The aircraft's approach course was orthodox. The weather was calm and the sky clear and moonlit. The plane had in all probability overflown the airstrip, which ran approximately east-west, from the south or south-east, and had then embarked on a left-handed circuit prior to landing from the west. Air traffic controllers at Ndola conventionally allow about 4 minutes for aircraft to complete this manoeuvre: one minute northbound, two minutes westbound and then two minutes to complete an arc bringing the aircraft into line with the runway. It was evidently on this final arc, by now on a south-easterly orientation, that the *Albertina* crashed into the forest below.

7.3 It was judged by the experts who inspected the scene that the aircraft had been flying near-horizontally, banking slightly to port, as it touched the treetops. From this point its angle of descent increased to about 5°, and the banking angle also increased as the plane's left wing struck first the trees and then the ground close to a 12-foot high anthill, causing the aircraft to cartwheel, breaking off its right wing and coming to rest facing west. The nose-cone had become detached. The plane's fuel reserve, which the pilot had indicated might need topping up at Ndola but which was estimated by the UN inquiry to exceed 5 tons, was spread over the final

300-350 feet of the trajectory from its near port engine, and appeared to have been sprayed over the wreckage itself from the starboard engines.

7.4 Uncontested expert evidence later established that the landing gear had been lowered and locked in position, that the engines had been under power at the moment of impact, and that the flaps were set at a conventional 30° angle for landing.

7.5 Four watches on the bodies found in the wreck had stopped within two minutes of each other, enabling a time between 0010 and 0015 to be fixed as the moment of impact — a time corresponding closely with the landing circuit we have described following Captain Hallonquist's last recorded call to Ndola. While it is possible that further radio traffic between the control tower and the aircraft went unrecorded, it is more probable that if radio contact with the control tower was severed, it was by a critical event involving the aircraft itself.

7.6 The inference was drawn by the contemporaneous inquiries that the spilt fuel had ignited on impact. One theory which we shall have to examine, however, postulates that the plane was deliberately set on fire after it had crashed. For the present, therefore, we record that when officials reached the scene (not apparently for the first time — another contentious issue) shortly after 1500 on 18 September, almost four fifths of the fuselage had been consumed by fire, together with all but two of the passengers. These two were Sgt. Harold Julien, the acting chief security officer, and the Secretary-General. Both men were found outside the area of conflagration. Julien was extensively burned but otherwise uninjured apart from a fractured ankle, and was conscious and articulate. He survived for 6 days in hospital. Dag Hammarskjöld was dead but untouched by the blaze. His injuries are a distinct issue to which we shall come.

7.7 Of the burnt bodies, that of the UN guard Serge Barrau was found in the cockpit. The possible significance of this, which we will look at later, is that Barrau, a Haitian, was bilingual in French and English.

7.8 Barrau was one of several of the crash victims who were found to have bullets embedded in their bodies. A variety of weapons was being carried. There is an issue (see section 13.33 below) about the capacity of fire to cause ammunition to discharge.

7.9 There is evidence from more than one source (see section 13.31 below) that holes resembling bullet-holes were observed in the burnt-out fuselage.

7.10 The destruction of the aircraft by impact and by fire made a detailed search for evidence of mechanical failure impracticable. All that can be said is that there was no evidence of any such failure.

Pilot error?

7.11 One possible form of pilot error suggested at the time was that Ndola in Northern Rhodesia had been confused by the crew with Ndolo, the former airport of Leopoldville in the Congo. Since Ndolo lies at a much lower altitude than Ndola, using the Ndolo chart would have misled the pilot into thinking he had greater freedom to descend. But there is no evidence whatever that any such elementary confusion had occurred, and good evidence, if the record of the plane's radio communication with the Ndola control tower is in any degree reliable, that it had

not. Nor are we aware of any prior or subsequent history of navigators making such an error. This, and the expert advice which has been furnished to the Commission, all but excludes any such elementary confusion.

7.12 Ndolo, which was Leopoldville's former airport and many hours away, had at the time no approach control and no tower: the instrument landing chart made this clear, and it would anyway have become clear when the crew started to search for a tower frequency. Since Ndolo was less than 1,000 feet above sea level, it would have been obvious to an experienced pilot such as Hallonquist that the *Albertina*'s approach altitude of 6,000 feet was far too great; whereas for Ndola, 4,160 feet above sea level, it was appropriate. Moreover the instrument approach run to Ndolo was east, then right, then left; while the course which the *Albertina* was clearly following — and which was the correct one — was pretty much the reverse of this.

7.13 "Finally," the Commission's expert adviser Sven Hammarberg writes,

> "the best indicator that the Ndolo (Leopoldville) chart was not in use is that it was found inside the military manual mentioned above [the USAF/USN Flight Information Manual]. The Ndola plates were missing from the recovered Jeppesen manual, and the best and most natural explanation to that is that they were placed in front of the pilots (where they should be) at the time of the crash."

7.14 There is thus no concrete support for the Ndolo theory, and much in Captain Hallonquist's navigational experience to contraindicate it.

Controlled flight into terrain

7.15 The two aviation experts advising the Commission, accident investigator Sven Hammarberg and John Hansman, Professor of aeronautics and astronautics at MIT, conclude that all the objective evidence — above all the configuration of the swath cut by the plane through the trees and the distribution of the wreckage — points to a controlled flight into terrain (CFIT).

7.16 A CFIT is defined by the official international body CAST/ICAO as:

> "In-flight collision or near-collision with terrain, water, or obstacle without indication of loss of control."

7.17 It follows, in the experts' view, from the localised wreckage distribution that there can have been no mid-air explosion sufficient to detach parts from the aircraft in flight. Having descended and struck the treetops, the plane had "continued in an almost normal angle of descent towards the ground."

7.18 If this were all, it would represent the end of any further inquiry. It might, for instance, be regarded as a sufficient explanation for a CFIT that on the approach path the ground rises ahead of the aircraft, briefly obscuring the airport lights. But Sven Hammarberg's report (with which Professor Hansman has indicated his agreement) goes on:

> "However, some sabotage and attack theories are not fully eliminated due to this pattern solely, namely those [which] speak of a certain but limited loss of controllability, alternatively distraction or injuries to the pilots. Theories like these have to be discussed with other facts involved than just the swath cut and the wreckage pattern."

7.19 The report goes on to explain that the CAST/ICAO definition of a CFIT

> "does not cover external hostile action intended to disturb a crew; that kind of influence would cause something that I would characterize as an *uncontrolled* flight."

7.20 The report concludes that

> "there is no need at all for external disturbances or hostile acts to make an accident look exactly like what we see in the SE-BDY case."

The Commission readily accepts this. But the fact that there is no need for any such external cause to explain the disaster does not by itself mean that there was none. What it means, as the passage quoted above in section 7.18 makes clear, is that any external cause

(a) has to come from other evidential sources, and

(b) has to be consistent with known facts.

7.21 In the remainder of this report the Commission seeks to evaluate the evidence of possible external causes by these criteria, keeping in mind — as pointed out in section 2.12 above — the need to reach its own views on a number of matters on which others have formed sometimes strong views of their own. In the absence of firm evidence of some more probable external cause, and in spite of the experience of Captain Hallonquist and the normal conditions in which he was coming in to land, the CFIT analysis will continue to stand.

8. Dag Hammarskjöld's death

The finding of the bodies

8.1 The apparent delay of the Rhodesian authorities in acknowledging the discovery of the wreck by at least 9 hours, and possibly more, has inevitably given rise to suspicions that something was being done during those hours which they wished to conceal. Of many theories that have been advanced, the starkest is that, during the night or at dawn, Hammarskjöld had been found alive either in or near the wreckage and had been taken a short distance away and shot, while the plane was set on fire. The less extreme version is that Hammarskjöld, although thrown clear, must have been killed by the impact, but that a ground party was waiting to ensure that he was dead. In either case, it is also postulated that the Federation authorities at some level knew what was planned and sought to maximise the time in which it could be accomplished.

8.2 We will deal later in this report with the probability that the wreck was found during the night or at dawn. The official account, given to all three inquiries, was that it was following the first location of the crash by Flying Officer Craxford at 1510 on 18 September that police vehicles and ambulances went to the site, that Hammarskjöld's body was found and that Julien was located and finally received treatment.

8.3 This is itself called in question by Ray Lowes' recent account, referred to in section 14.13 below, to the effect that earlier in the afternoon a police search party had been led to the site by an African man suspected of looting the wreck. He goes on in his statement to describe the finding of Hammarskjöld's body:

> "I found the body of Dag Hammerskjold [*sic*], on his back, in an area just a few feet outside this burnt area. He had superficial external injuries, scratches, bloodstains, etc., and was covered in dust and fine debris. I checked for life but found none. I closed his eyes. ... On the ground near the Secretary General were quite a few playing cards. I recollect spotting the Ace of Spades and thought how ominous that was. I understand that somehow the Ace of Spades was subsequently placed on his body, but I do not know how that happened."

8.4 The suggestion which has been advanced that the plane had not crashed in flames but was set on fire by the first party to reach it, having found Hammarskjöld alive, taken him out and killed him, cannot readily coexist with the testimony of Sgt. Julien and others that the plane suffered some kind of explosion or otherwise caught fire in the air; nor with the corollary that the perpetrators must have left Julien alive to tell what they had done; nor with Julien's not having described any such event while hospitalised.

8.5 For these reasons we think the single reliable inference from the known facts is that the Secretary-General had been thrown clear of the wreck before it was engulfed in flames. This inference, which can coexist with any of the postulated causes of the crash, requires us to turn to one of critical areas of our inquiry, the autopsy, in order to consider what may have happened thereafter.

The post mortem findings

8.6 The autopsy report prepared for the initial Rhodesian inquiry advances no inference as to the cause of death, and addresses neither the issue of temporary survival nor the question of Hammarskjöld's body having been moved before or shortly after death.

8.7 The Norwegian head of military intelligence in Congo, Major-General Björn Egge, travelled to Ndola after the crash to collect the Secretary-General's effects and was allowed to see the body in the mortuary. In 2005, two years before he died, Egge stated that he had seen a round hole in Hammarskjöld's forehead which could have been a bullet hole. (Egge had a distinguished war record as a member of the Resistance and will not have been a newcomer to such lesions.) He regarded the facts that the post-mortem photographs did not show the wound, and that the autopsy report made no reference to it, as in themselves suspicious. There are marks on the post-mortem photographs which are capable of being the result of retouching (the Commission has been unable to trace the negatives), but the pathologists whose report is summarised in section 8.9 below consider the marks to be consistent with pressure pallor.

8.8 In the prologue to her book, Dr Williams records the views of three leading experts consulted by her, the pathologist Robert Vanhegan, the ballistics expert Peter Franks and the forensic scientist Peter Sutherst, on the dependability of the contemporary photographic and autopsy evidence found in the Rhodesian files. All three experts gave reasons for questioning the official account, albeit without being in a position to substitute firm conclusions of their own. Dr Vanhegan deduced from the medical summary available to him that the Secretary-General had been rendered unconscious by the crash, had been thrown from the aircraft by the impact, and had died either instantly or rapidly of his cerebral and other injuries without regaining consciousness. Mr Sutherst and Mr Franks noted odd features of the crash scene,

and the striking absence of any photograph of the Secretary-General's body in the place where it was apparently found.

8.9 The Commission has had the benefit of its own report, prepared by three distinguished European pathologists, Professor Lennart Rammer of Linköping, Professor Christer Busch of Uppsala and Dr Deryk James of Cardiff. Their key conclusions are that, notwithstanding some inadequacies in the Rhodesian autopsy report and the continuing unavailability of the autopsy x-rays:

(a) There is no reason to think that any more complete autopsy report has ever come into being.

(b) "There is no evidence from the autopsy report that Dag Hammarskjöld had been shot, subjected to explosion or exposed to smoke." The marks on the right temple, the left lower jaw and the base of the nose are consistent with other observed trauma. The mark visible on and around the right temple is consistent with pallor resulting from pressure of the face against a supporting surface.

(c) The appearance of the injuries "strongly suggests that they were caused by decelerating force during ejection from the aircraft and subsequent impact of the body against the ground". Observable bleeding "suggests that he was alive when the injuries were sustained", but consciousness will have been lost and not regained, and survival was probably brief.

(d) Hammarskjöld must have been thrown clear on impact, since the chest injuries were so massive as to render him unable to escape by his own actions. There is no marking to suggest he was wearing a seat belt.

(e) The principal cause of death was in all probability not intra-cranial lesion but respiratory failure brought about by crush injury, causing fractures of the ribs, sternum and thoracic spine with bleeding into the pleural cavities.

(f) It is nevertheless puzzling to see so little trauma externally or reported to the internal organs, given the severity of the skeletal damage. The loss of the X-rays referred to in the autopsy report, and of full post-mortem photographs, compounds this. In their absence, the only option would be radiological examination by CT scan following exhumation.

(g) The position of the limbs in rigor mortis, shown in the mortuary photographs, together with the blood tracks on the face and the distribution of lividity and pressure pallor, suggests that the body had first lain face-down, then face-up, before being moved to a sitting or semi-upright position.

8.10 The Commission considers that the foregoing is the most dependable basis on which to proceed; but it would be subject to radical revision if evidence were ever to emerge of one or more bullet wounds to the head. The most obvious source of certainty about this would be the autopsy x-rays, but so far every effort made by the Commission and others to trace these has failed.

8.11 With respect to the advice of the Commission's pathologists that CT scanning can today provide detailed examination without disturbing the integrity of the body, we record this as a fact without making any recommendation in relation to it. It must be a matter of the greatest personal and national sensitivity, and it is not one in which the Commission feels it has any role.

Was the body moved?

8.12 The evidence now strongly suggests that at an early stage Hammarskjöld's body had been found, face-down and clear of the blaze; that he had been turned on his back (in which position Ray Lowes found him early next afternoon) to ascertain whether he was alive or dead; and that he had then been propped against a nearby termite mound, which is where he was found initially by charcoal-burners at dawn and then on the eventual arrival of the official search party. Unpleasantly, it looks as if at the latter stage somebody had taken the opportunity to place a playing card (allegedly an ace of spades) in his collar, where it (or something like it) can be seen in the photographs taken of the body on a stretcher at the site.

8.13 A substantial amount of evidence thus points to the Secretary-General's body having been found and tampered with well before the afternoon of 18 September and possibly very shortly after the crash. The evidence is, however, no more consistent with hostile persons assuring themselves that he was dead than with bystanders, or possibly looters, examining his body. The failure to summon or send help, however, remains an issue.

9. The previous inquiries

9.1 Two days after the crash, the Rhodesian Federal Department of Civil Aviation set up an air accident investigation as required by the international civil aviation authorities. The report of the Board of Investigation, which sat in private, concluded that the aircraft's approach to the airport had been normal and correct, except that it was about 1,700 feet lower than it should have been. It concluded that the evidence did not allow for a 'specific' or 'definitive' cause for the crash, because so much of the aircraft had been destroyed and there was so little information from the single survivor, the UN security officer Sgt. Harold Julien. While it found that pilot error was a possibility, it was unable to rule out the 'wilful act of some person or persons unknown which might have forced the aircraft to descend or collide with the trees'.

9.2 As will be seen, the Commission concurs with this conclusion, which it considers compatible with its own expert evidence. The essential purpose of the present report is to consider whether any of the evidence now pointing to such a wilful act merits fuller consideration.

9.3 The initial investigation was followed by two major public inquiries. The first was a Rhodesian Commission of Inquiry, chaired by the Chief Justice, Sir John Clayden, which reported in February 1962. It concluded that the approach to the airport had used a visual descent procedure which brought the aircraft too low. The Commission could not say

> "whether that came about as a result of inattention to altimeters or a misreading of altimeters. But the conclusion to which we are forced is that the aircraft was allowed by the pilots to descend too low, so that it struck the trees and was brought to the ground."

9.4 The second public inquiry was conducted by a United Nations Commission. Its report, delivered in April 1962, recorded that it had found no evidence of sabotage or attack but that these possibilities could not be excluded. Nor had it found evidence of a material failure of the aircraft, but this too could not be excluded 'mainly because of the destruction of a major part of the aircraft by fire'. In relation

to the possibility of human failure, the Commission found no evidence that any of the pilots had been incapacitated but could not completely exclude this since there were some forms of incapacity which might not be revealed by a post-mortem examination. It also considered various possibilities of pilot error, including the use of an incorrect instrument approach chart or a misreading of the altimeters. Although it felt unable to exclude this possibility, it found no indication that it was the probable cause of the crash.

9.5 In answering the question which has been put to us, namely whether the United Nations General Assembly would be justified in reopening the last of these inquiries, as its resolution of 26 October 1962 contemplated it might do, a certain amount will depend on the thoroughness and quality of all three former investigations.

9.6 The tally of evidence taken by the three inquiries is set out in the Leiden University schedules which the Commission is placing on its website (see section 1.12 above). It is a fact, albeit not a criticism, that none of these inquiries was conducted to the standard to which a modern inquiry into a fatal event would be conducted in the light, in particular, of contemporary case-law on the right to life. Nor was any apparent effort made to locate witnesses among the local population. The civil aviation investigation reached a balanced but inconclusive verdict on limited material. The Rhodesian Commission of Inquiry showed signs in its report of a desire to lay the case to rest by blaming the pilots. We do not think it useful to subject these two inquiries to more detailed analysis or criticism, but it is relevant that the evidence available to them was also available to the UN Commission of Inquiry.

9.7 The UN Commission, like the Rhodesian Commission before it, based its examination of witnesses to a large extent on the statements made by the witnesses to the initial Board of Investigation. These statements were themselves only the Board's own summaries of testimony of which it preserved no records, and a number of the witnesses were more equivocal when questioned by the two succeeding commissions than the summaries of their evidence to the Board suggested. Beyond this, the UN Commission appears to have been conservative in the selection of witnesses it heard, not only among those who had testified to the previous inquiries but among those who had given their evidence only to the police (for instance two witnesses, Chappell and Joubert, who said they had seen a second aircraft in the sky).

9.8 More broadly, the UN Commission seems to have been influenced by the Rhodesian Commission's dismissive view of some of the witnesses it had heard. The approach of the Rhodesian Commission can be gauged from its statement:

> "At the outset we would say no reason was suggested, and we cannot think of one, why anyone who might have been able to attack this aircraft from the air should ever have wanted to attack it as it carried Mr Hammarskjöld on the mission he was then undertaking."

When the UN Commission in its turn reported that it "did not consider it necessary to duplicate all the work already done", we respectfully think that it may have been surrendering part of its judgment to a less reliable predecessor. It appears, among other things, to have adopted the Rhodesian Commission's view that those African

witnesses who claimed to have seen other aircraft in the vicinity of the DC6 were seeking, for nationalist reasons, to embarrass or discredit the Federal government.

9.9 The approach of the Rhodesian Commission appears in particular to have led the UN Commission to underrate or marginalise the evidence of the sole first-hand witness of the disaster, Sgt. Julien. The report of the UN Commission does not discuss Julien's reliability; it simply places no reliance on what he was reported to have said. We deal later in this report (see sections 12.7-15) with what Julien is known to have said during the six days of his survival, and with his apparent condition during that time. The initial Board of Investigation appears to have been persuaded by the evidence of the surgeon who had overall but not clinical responsibility for Julien's care that Julien throughout his time in hospital was not coherent, so that nothing he said was reliable. As will be seen, other doctors and nurses gave a different picture, but were not taken seriously by the Board of Investigation. One apparent consequence was that, out of 27 possible witnesses who were able to testify about Julien, the Rhodesian Commission heard 8, and the UN Commission 5 of these 8.

9.10 To the foregoing we add a note of concern about one further aspect of the UN Commission's information-gathering process, part of which was entrusted to a single person, Hugo Blandori. In his report to the UN Commission dated 21 February 1962, which is not annexed to the UN report but has survived in the papers preserved by Transair's chief engineer in Congo, Bo Virving, Blandori describes himself as a consultant, albeit without stating his qualifications or specialism. His first two sections deal with Captain Hallonquist and the refuelling of SE-BDY. The report then records the detail of various witnesses' testimony, including that of some of the African witnesses. "Concerning the African witnesses," it concludes, "I wish to point out that it is most difficult to distinguish from their testimony what is truth and what is fiction or imagination. There were so many inconsistencies and discrepancies in their stories that to have believed them would refute the testimony of other witnesses who are generally accepted as being reliable." There is more in this vein; then: "As a consequence, I am of the opinion that the testimony of the African witnesses to the effect that they saw one or more small crafts [*sic*] flying along with SE-BDY just prior to its crash, has to be accepted with a grain of salt." The final paragraphs of his report suggest that the UN Commission had been attracted by his suggestion of running checks on "the background, character and associations of the African witnesses", though his eventual advice was that it was too late to do this. The fact-finding of the UN inquiry appears to have been in some measure dependent upon Blandori's appraisals.

10. The Commission's approach

10.1 The Commission has set out in section 7.21 above how it proposes to approach the evidence which is now available.

10.2 In the course of the half-century since the disaster, alternative explanations have proliferated. It is as unhelpful simply to dismiss them all as conspiracy theories as it is to treat them all with equal solemnity. This report makes no attempt to traverse the entire ground covered by them. Rather, in this section the Commission proposes to explain why two of the more prominent theories are in its judgment insubstantial, and how it proposes to approach the more substantial ones.

The altimeter theory

10.3 As we have already noted (see section 6.5 above), the plane's three altimeters were found, after the crash, to be correctly calibrated. All three readings — respectively 30.14 inches, 30.16 inches and 30.18 inches — corresponded closely with the Ndola QNH (barometric pressure adjusted to sea level) of 1021 millibar. This finding, made by experts from the US Civil Aviation Board and technicians from the American manufacturer of the instruments, would be a complete answer to the theory that altimeter error caused the crash were it not for the written statement made to the Commission by Ingemar Uddgren, that during the *Albertina*'s fatal flight he had been in the control tower at Kamina (an airport used by the UN in Katanga) and had overheard a radio communication between the plane's radio operator, Karl Erik Rosén, and the Transair traffic controller at Kamina, in which Rosén had reported that Ndola was giving the pilot a QNH which the controller instantly recognised would cause the plane to crash.

10.4 The Commission accepts the advice of its adviser Sven Hammarberg that, for reasons which he has explored in his report, this account cannot be correct. If it were, the three altimeters would have had to be tampered with after the crash and the fire by one or more persons complicit in the conspiracy and with the necessary specialised knowledge. Apart from the want of any direct evidence to support this suggestion, it would have been almost impossible to make such adjustments on damaged instruments without its being evident to the experts who in due course examined them.

The 17th passenger theory

10.5 It has been suggested in the past that the crash was precipitated by an attempt by an infiltrated 17th passenger to hijack the aircraft. Among the reasons advanced for a hijacking is the desire of representatives of the European mining interests to persuade the Secretary-General that the UN should not persist in opposing the secession of Katanga by military force. But whether the infiltrator is assumed to have been an armed civilian or mercenary, or — as has also been suggested — a Belgian pilot, and making the further large assumption that in the course of a security-conscious journey nobody noticed a stranger on board, two things remain inexplicable. One is that the hijacker must have waited until the plane was about to land at Ndola before making his move, when there had been numerous and probably better opportunities for diversion en route. The other is that, since only sixteen people, all of them identifiable, were found at the crash site, either a 17th body had been found, identified and then concealed, or the hijacker had survived and escaped or been rescued. While few things are impossible, we regard this scenario as involving far too many unrealistic assumptions to merit further examination.

The sabotage claims

10.6 Evidence has emerged from a South African source (see sections 12.32-39 below) supporting a claim that the plane's steering gear was disabled by a bomb placed in the plane at Leopoldville and detonated, either deliberately by radio command or fortuitously by gunfire, on the final approach to Ndola. For reasons which we will give, we do not consider the principal source of this claim trustworthy. This does not automatically mean that the claim is false, but it must depend for verification on other evidence which is so far lacking.

10.7 A second and different sabotage allegation, quoting verbatim an alleged Central Intelligence Agency report submitted to President Kennedy in 1962, was made in the August 1978 issue of *Penthouse* (a periodical which, contrary to appearances, sometimes carried serious investigative articles). This was an allegation, first mentioned in the *Washington Post* on 3 June 1978, that the Soviet intelligence agency, the KGB, had placed a bomb on the aircraft because the Soviet Union was angered at Hammarskjöld's resistance to its proposal that his office should be replaced by a "troika" of officials representing what were then known as the first, second and third worlds. The quote alleged to come from the CIA report reads:

> "There is evidence collected by our technical field operatives that the explosive device aboard the aircraft was of standard KGB incendiary design."

10.8 While there is at present no evidence from any source known to the Commission to support this claim, and a certain amount in it to inspire scepticism, it would clearly be of value to any future investigation to know on what evidence the CIA report (assuming it to have been accurately quoted) was based.

The possibility of aerial threat or attack

10.9 Inevitably, claims have been made by a number of individuals to have shot down the *Albertina* or to know who did. Not more than one of these can in any event be true, and any such claim must be consistent with established facts before it is worth investigating. As will be seen, the Commission considers that only one of the claims that have been made is capable of passing this test.

The possibility of mercenary involvement

10.10 Some evidence has emerged suggesting that armed men were rapidly on the scene of the crash. We shall consider this evidence and its possible implications in relation to responsibility for the crash. We need, however, to add a note of caution. By the start of 1961, according to the UN's estimate, some 500 foreign mercenaries were attached to the Katangan army. The pay — some £4000 a year plus keep — was munificent by 1960s standards. It is likely that the principal paymasters were Belgium and South Africa, but it is also distinctly possible that there were commercial sources. A number of European and South African mercenaries feature in the story we trace. Because the *demi-monde* inhabited by such individuals is rife with confabulated and self-aggrandising stories, we approach all of them on the basis that nothing originating from them is likely to be taken on trust by any future inquiry and that anything they say will require independent corroboration.

The response of the authorities

10.11 We describe in sections 14.8-10 below how the site of the crash, which occurred just after midnight, was purportedly not located until the middle of the following afternoon. Sections 14.11-17 describe the cause for concern at this official account, and the reasons for thinking that both Federation personnel and members of the public, and possibly others, were on the scene a good deal earlier. Suggestions have been made that the sequence of events and non-events, which left Sgt. Julien to suffer for hours in the heat of the day without rescue or care, is evidence of something worse than incoordination or incompetence, namely collusion.

11. The external cause hypotheses

Methodology

11.1 In the half-century which has elapsed since the disaster, testimonies and theories explaining the death of Dag Hammarskjöld have proliferated. Given that the first and third of the initial inquiries were unable to reach a conclusion about its cause, and that, for reasons given earlier (see section 9.6), the second (the Rhodesian Commission of Inquiry) commands less respect, this is unsurprising. Suspicion has been fed and compounded by the continued inaccessibility of some official archives and the apparent absence of significant documents from those which have been accessible. In the course of our work we have succeeded in closing a number of these gaps, but by no means all of them.

11.2 We record here in particular the assistance which we have had, in seeking to focus our search, from the National Security Archive at George Washington University, DC. At the date of this report, however, the Commission's request for disclosure of what it now regards as critical intercept records was still pending and potentially facing obstacles to declassification. The remainder of this report explains why we consider this a focal point.

11.3 We do not consider that the lapse of time alone is fatal to credibility. Witnesses' accounts of events vary considerably in their reliability, from the imprecise but dependable to the pellucid but untrue; but it is a spectrum which, in our experience, bears little direct relation to the simple passage of time. We have borne in mind that in real life the improbable not infrequently occurs. We have also borne in mind that the fact that an individual has not given a truthful or a reliable account does not mean that the converse of their testimony is true. This has a particular bearing on some of the telegraphic traffic we have seen, which contains inconsistent accounts of the last known movements of the *Albertina*. Rejecting one of these accounts does not logically mean accepting the other; nor does it logically mean rejecting both. Rather, it throws one back on to a search for more reliable evidence.

The Truman statement

11.4 It is appropriate to note here one freestanding piece of evidence which, though not primary, has a possible bearing on our conclusions. On 20 September 1961 the *New York Times* reported that former President Harry S. Truman had said to reporters:

> "Dag Hammarskjöld was on the point of getting something done when they killed him. Notice that I said 'When they killed him'."

The report continued:

> "Pressed to explain his statement, Mr Truman said, 'That's all I've got to say on the matter. Draw your own conclusions."

11.5 There is no reason to doubt the accuracy of the *New York Times*' report. What we consider important is to know what the ex-President, speaking (it should be noted) one day after the disaster, was basing himself on. He is known to have been a confidant of the incumbent President, John F. Kennedy, and it is unlikely in the extreme that he was simply expressing a subjective or idiosyncratic opinion. It

seems likely that he had received some form of briefing. As to one possible source and what it may have contained, see section 10.7-8 above.

Eyewitnesses

11.6 There is considerable variation in the eyewitness evidence capable of establishing an external cause of the disaster. Some of it suggests that the *Albertina* was brought down by an aerial explosion; some that it was brought down by aerial gunfire; some that it blew up on impact; some that it was set on fire on the ground. Further, while some accounts appear to describe the plane being fired upon, and others to describe it blowing up, one cannot wholly ignore the possibility of the one triggering the other.

11.7 Very little of the first-hand testimony describes simply a precipitous descent into forest terrain followed by spontaneous ignition. The nearest we find to the latter is the account of an apparently unprovoked explosion at ground level, recorded by a police inspector, Marius van Wyk, who was on guard duty at the provincial commissioner's house where Moise Tshombe was spending the night. He testified that at about 0020 (though he was uncertain about times) he had heard and seen a large aircraft, identifiable by its red navigation light and following an arc consistent with approach to the airfield. It went out of view behind trees, but 3 or 4 minutes later, although he heard no explosion, he saw "an unusual deep red glow spreading upwards into the sky... There were trees between the glow and me."

11.8 Van Wyk's statement to the Board of Investigation, however, spoke of the aircraft as similar in size to a Canberra. It also recorded that at about the same time he had heard another aircraft start up but not take off. This was omitted from the version of his evidence submitted to the Rhodesian Commission of Inquiry. His statement has also to be situated alongside the evidence, to which we will come, that the plane was found soon after it had crashed and was deliberately set on fire, since it may be suggested that this is what van Wyk saw.

11.9 In a statement made in January 2013 to the Commission, Adrian Begg, then an assistant inspector in the Northern Rhodesia police, on duty at the airport, recounted seeing a large piston-engined aircraft overfly the airport towards midnight on what appeared to be a normal landing approach, but not return. Later in the night he learnt what van Wyk had seen and, fearing that the plane had crashed, sent out a Land Rover patrol along a forest track between the Ndola-Mufulira road and the Ndola-Kitwe road. It found nothing, and turned out in fact to have been some miles from the crash site; but the vehicle and its occupants could well have been seen by local people.

11.10 With the foregoing in mind, we turn to the two principal external intervention theories, sabotage and aerial attack or threat, noting as we do so that the evidence about them is not in watertight compartments. For instance, although we consider Harold Julien's evidence under the head of sabotage, since he had said that the plane "blew up", his reported statements that Hammarskjöld had told the pilot to turn back are equally, perhaps more, consistent with a threat to the plane's safety.

12. Sabotage?

12.1 There is no direct evidence of a bomb on board the *Albertina*. But there is (a) first-hand evidence, (b) circumstantial evidence and (c) secondary evidence capable of supporting this hypothesis.

Circumstantial evidence

12.2 There was an undoubted opportunity for placing an explosive device on board the *Albertina* while it was on the ground prior to departure from Leopoldville for Ndola. The aircraft had been fired at on take-off from Elisabethville that morning, and repairs had to be carried out to it before it departed for Ndola. There will have been nothing overtly suspicious about mechanics apparently working on the aircraft shortly before take-off.

12.3 The Commission's expert advice from Major Dan Perkins on the kinds of explosive and detonation equipment which would have been available for such a purpose in 1961 is that a charge of 6lbs or less of TNT (cf. section 12.34 below) would have been sufficient, if placed in the flight controls hatch, to bring about a loss of control of the aircraft and, if placed in the control cables hatch or the nose-gear well, also to incapacitate the crew. While a variety of forms of detonation was possible, projectile command (detonation by a bullet) would have required a degree of accuracy practically unattainable between aircraft at night; a barometric or mechanical switch would probably have functioned on take-off if at all; but two forms of radio-controlled detonation were feasible.

12.4 Both methods were VHF-to-VHF: a very high frequency receiver connected to the detonator and pre-tuned to a chosen frequency. Detonation could then be triggered either by any transmission using the Ndola control tower frequency or on a selected frequency by a separate transmitter. Since it is probable that at least half an hour passed between the *Albertina* making contact with the Ndola control tower and the crash, the first of these mechanisms is all but ruled out, leaving the second — a dedicated transmitter — as the working hypothesis. The widespread knowledge that Ndola was the Secretary-General's destination (see section 13.3 below) would have facilitated the use of this method.

12.5 It is possible, but no more, in the light of this circumstantial evidence that a bomb was placed aboard the aircraft, primed to explode on receipt of a targeted radio signal from the ground. By itself this is a long way from a tenable finding that it is what happened, and the Commission notes Sven Hammarberg's opinion that the plane's mode of descent appears inconsistent with a bomb in the gear compartment.

Primary and secondary evidence

12.6 However, there is also relevant primary and secondary evidence of an explosion of some kind. Some of the primary evidence — that of the sole survivor, Sgt. Julien — was available to the previous inquiries. There is now other eyewitness evidence supporting Julien's account, and possible secondary evidence has come to light.

Harold Julien

12.7 Sergeant Harold Julien, the acting ONUC chief security officer, was found alive and badly burned near the wreckage of the plane. He was left exposed to the heat of the day until, in mid-afternoon, the wreck was officially found (see sections 14.8-10 below). But on admission to hospital he was conscious and able, at least intermittently, to speak coherently. There was a tape-recorder nearby in the ward, but it was not used.

12.8 Police Inspector A. V. Allen, who spoke to Julien shortly after his admission to hospital on 18 September, reported that Julien had made these statements to him:

"It blew up"

"There was great speed, great speed."

"Then there was the crash."

"There was a lot of small explosions all around."

"I pulled the emergency tab and just ran out."

12.9 Allen accepted that a further statement attributed to Julien ("It was over the runway") represented Julien's assent to a leading question asked by Allen in initiating a dialogue ("Was this [explosion] over the runway?"). It should not therefore be regarded as an elaboration of Julien's account.

12.10 Nurse D. M. Kavanagh recounted that, at about 0400 in the night following his admission, Julien had given her his name, rank and position and had asked her to inform Leopoldville of the crash. He had then said: "Tell my wife and kids I'm alive before the casualty list is published", and gave his wife's name and place of residence. He had asked "Am I going to make it?" and had responded to simple questions, probably about his comfort. This account, and at least one similar account given by Nurse Hope, gives no support to the suggestion advanced by senior inspector Wright that Julien was "rambling".

12.11 This in turn calls attention to the testimony of Nurse Joan Jones that Julien, in addition to speaking repeatedly of someone named Bob, had spoken of "sparks in the sky". Evidence was given to the Rhodesian inquiry by Donald McNab, a government surgeon, that one of the symptoms of uremia — the eventually fatal condition developed by Julien — was "spots and flashes of light before the eyes". Note has to be taken of this suggested symptomatology; but it is perhaps surprising that McNab, who was in charge of Julien's treatment throughout, appears to have had nothing else to say about him except that "The statements made [by Julien] on admission to hospital (18 September) are unreliable because he was delirious at that time." If this was intended to describe Julien's continuing condition, it appears to have been mistaken.

12.12 Mark Leytham Lowenthal was the junior doctor who had the care of Julien under McNab's supervision. Lowenthal testified to the UN Commission of Inquiry that he had sedated Julien on admission (morphine had already been administered at the site) and had proceeded to ask him about the crash. Asked why the plane had not landed as expected, Julien had replied that Hammarskjöld had changed his mind or had said 'Turn back'. He then said that there had been an explosion and a crash, first in that order, then in the other. As to how he had got out of the plane, Julien said that he had jumped from it.

12.13 Questioned as to whether in the circumstances what Julien had said was reliable, Lowenthal testified:

> "In the ordinary course of events I would be somewhat dubious about a man's statement having had those drugs together with the injuries that Sergeant Julien had sustained, but his manner of speech was certainly lucid and clear, and ... the flow of words from [him] was, I would say, coherent."

The cross-examination which followed did not materially alter or weaken this testimony.

12.14 Professor Lowenthal, as he now is, has written to the Commission that although Julien, who was being cared for by him in the European hospital in Ndola (Lowenthal normally worked in the African hospital), was "severely burned, dehydrated, thus confused", Lowenthal "did try to extract as much information as possible" from him. He confirms that what Julien said to him was given by him in evidence to the Rhodesian and UN inquiries. Years later, in a published interview, he said:

> "Julien was a strong young man and, with the best that modern care of the time could offer, would have survived.... A maturer me would have unofficially told the Americans to send an aircraft to take him to the US quickly."

12.15 Although it does not purport to be first-hand, the account recorded by an experienced and observant journalist, Marta Paynter, is worth noting. It would appear that she had spoken to Julien's wife, who had arrived by air on the Wednesday and had remained with her husband until he died. Paynter recorded that Julien, although sedated, had had lucid periods, in one of which he "spoke of an explosion before the crash and whispered 'Go back, go back.' A nurse who was attending to him asked "Go back where?" Paynter reports Julien's reply: "Dag said 'Go back'; he said it several times."

12.16 If this is right, it suggests a newly perceived threat or attack as the plane approached Ndola, involving possibly but not necessarily a sudden explosion. This theory is considered further in section 13 below.

Eyewitnesses

12.17 The Commission has received eyewitness testimony which was not heard by any of the three initial inquiries. Most of these African witnesses had believed in 1961 that they would not be listened to, and indeed might get into trouble, if they told the Rhodesian authorities what they had seen. Some knew nothing of any inquiry. The witnesses, all of them now elderly, were interviewed by two members of the Commission in Ndola in May 2013. Apart from Mr and Mrs Mulenga, they had not known each other. (These witnesses, and some others, had made statements in 2010 and 2011 to Jacob Phiri and to a Swedish researcher, Göran Björkdahl, who has helpfully made them available to the Commission.) With the assistance of an interpreter these witnesses gave their evidence to the two members of the Commission in Bemba.

12.18 A word of clarification is needed about the presence of charcoal burners in the forest at night. It was explained to us by the witness Custon Chipoya that once a kiln had been packed with wood, it was necessary, before sealing it and leaving it to

smoulder, to be sure that fire had been set to every part of the stack. This was difficult to accomplish in daylight.

12.19 John Ngongo had gone to the forest with his neighbour Safeli Soft, a charcoal burner who has since died, to learn about charcoal burning. He described how they saw "something in the sky ... coming down in a tilted position... Because of the sound you could tell it was a plane... It had already caught fire... Within the inside of the plane [we] could see some fire, but what [I remember] is that the fire was on the wings and the engines..."

12.20 Ngongo went on: "... as we were moving, getting towards the ... burning wreckage, we heard also another sound ... in the sky ... the sound of, like, a jet." This was as they were moving towards where the plane had come down. "There was quite a big inferno, so we couldn't get to the wreckage ... There were explosions within the plane and also the fire was quite strong."

12.21 Ngongo was unable to be more precise about the time than that "it could have been any time after 20 hours". He went on to describe how he and Soft had spent the night in the forest and then at first light made their way to the wreckage, which was still smouldering. They found Hammarskjöld's body lying back against a termite mound. His hands were behind his head and there was something like blood on his face. They heard no calls for help and did not see Harold Julien. It was not safe to go any closer to the wreckage: "There were still these explosions and the fire."

12.22 At a time which both of them put at early or mid-evening, Emma and Safeli Mulenga were watching for chicken thieves when Emma Mulenga saw a plane circling. It went round twice, then on its third circuit she saw a "ball of fire coming on top of the plane"; she was not sure whether it came from outside or inside the plane. The plane came down at an angle.

12.23 Safeli Mulenga's testimony to us was that what drew his attention to the plane was that it was circling. On its third circuit they saw "a flame ... on top of the plane ... like a ball of fire, just on the centre." Neither he nor his wife saw a second plane. In the morning, at about 0900, they heard from charcoal burners that a plane had crashed.

12.24 Custon Chipoya, a charcoal burner, recounted that he and his colleagues were sleeping after setting up a charcoal kiln. At about midnight (he had previously placed the event at 9 or 10 p.m.) he was woken by a plane coming from the north-east and circling. On its third round "we heard some kind of a bang and then the fire ... on top of the plane" and towards the front. Chipoya then saw a second, smaller plane following the first: "I saw that the fire came from the small plane ..."

12.25 Chipoya too went to the crash site next day. By the time he reached it, "early the following morning", it was surrounded by soldiers. We will return to this evidence when we deal with the Rhodesian response to the crash.

12.26 Margaret Ngulube, giving evidence to the commission, recalled sitting out on her verandah in the evening with her family when she saw two planes in the sky, the larger of them on fire. The fire was "in the wings", and the plane then fell in "a ball of fire" as the blaze increased. She heard a bang as the plane came down.

12.27 This witness did not try to go to the crash site, but she heard from others "about people having perished in the crash, and also of a certain lady who was ...

thrown out of the plane and was caught up in between some trees." We will return to this when we consider the Rhodesian response to the crash.

12.28 This evidence should be set alongside the evidence of local people given to one or more of the 1961-2 inquiries. The Leiden schedule referred to in section 1.12 above will make it possible to do this with relative ease; but it is sufficient for the present to say that it only hinted at the pattern of events described in the foregoing paragraphs of this report.

12.29 The accounts are visibly discrepant in a number of respects. They ascribe different times, most of them too early in the evening, to the episode. They are, however, consistent in describing a burning plane coming down, and largely consistent in describing the presence of a second, smaller aircraft close to it.

12.30 As to the testimony of the charcoal burner Custon Chipoya (see section 12.25 above) that he was stopped by troops at or shortly after dawn at the crash site, we do not consider it necessarily inconsistent either with the evidence that John Ngongo and Safeli Soft had been able to gain access and had found the Secretary-General's body at first light (its position is a separate question), or with the evidence that Timothy Kankasa had found the site deserted when he went there mid-morning. We are, however, troubled at the absence of any apparent endeavour by those who gained access to assist Harold Julien; for it seems highly likely that the "lady" who Margaret Ngulube was told had been calling out was Harold Julien calling for help. Alice Lalande, the only woman on board, had died in the crash.

12.31 This said, there is in the Commission's view enough primary evidence that the plane was on fire when it crashed to call attention to the hypothesis that it was caused to descend by some internal or external damage sufficient to reduce the pilot's control. As can be seen, much of the evidence which supports this hypothesis is equally capable of supporting the alternative hypothesis — that the pilot was attempting to evade an attack or a threat of attack — which is addressed in the next main section of this report.

The South African Institute for Maritime Research

12.32 In the course of the work of the South African Truth and Reconciliation Commission, in July 1998, a file was passed to that Commission by the National Intelligence Agency relating to the assassination in 1993 of the leader of the South African Communist Party, Chris Hani. In it the TRC's researcher found about a dozen documents relating not to Hani but to an operation codenamed 'Celeste'. The documents, which bore the letterhead of the South African Institute for Maritime Research, purported to report that a bomb planted on Hammarskjöld's aircraft had failed to explode on take-off from Leopoldville but had been activated before landing. If they were both authentic and truthful, these documents afforded a cogent account of the disaster and of some at least of those responsible for it.

12.33 Very little can be ascertained about the South African Institute for Maritime Research (SAIMR). The Commission has been unable to trace any scientific research published by it. It appears to have been succeeded by an organisation named the African Institute for Maritime Research, which is also based in South Africa.

12.34 The documents contain a series of messages. One of these, a manuscript document captioned "Orders" and dated 14 September 1961 (i.e. the day after Hammarskjöld's arrival in Leopoldville), reads (with two cropped words expanded):

1) DC6 AIRCRAFT BEARING "TRANSAIR" LIVERY IS PARKED AT LEO TO BE USED FOR TRANSPORT OF SUBJECT.

2) OUR TECHNICIAN HAS ORDERS TO PLANT 6 lbs TNT IN THE WHEELBAY WITH CONTACT DETONAT[OR] TO ACTIVATE AS WHEELS ARE RETRACTED ON TAKING OFF.

3) WE ARE AWAITING SUBJECTS TIME OF DEPART[URE] BEFORE ACTING.

4) WILL CONCENTRATE ON D.

5) REPORT WILL FOLLOW.

("Will concentrate on D" appears to signify focusing the attempt on Hammarskjöld rather than O'Brien or McKeown.)

12.35 These orders are preceded by a typescript document, undated but evidently relating to the early part of September 1961, which, if authentic, sheds disturbing light on the background. Among the decisions it purports to record, following a meeting between "M.I.5, Special Ops. Executive, and SAIMR", are these:

"UNO is becoming troublesome and it is felt that Hammarskjöld should be removed.

Allen Dulles [head of the CIA] agrees and has promised full cooperation from his people.

[?He] tells us that Dag will be in Leopoldville on or about 12/9/61.

.....

I want his removal to be handled more efficiently than was Patrice [Lumumba].

....

If McKeown and O'Brien can be dealt with simultaneously it would be useful but not if it could compromise the main operation."

12.36 The last document in the series, authentic or not, is a manuscript which appears to read:

Report

Operation Celeste 18.9.61

1. Device failed on take-off.
2. Despatched Eagle [.....] to follow and take [.....]
3. Device activated [.....] prior to landing.
4. As advised O'Brien and McKeown were not aboard.
5. Mission accomplished: satisfactory

Message Ends

To: Commodore

To: Captain

From: Congo Red

("Congo Red" appears from other documents in the series to be the *nom de guerre* of one of SAIMR's agents.)

12.37 At the TRC's final press conference in August 1998 its chairman, Archbishop Desmond Tutu, released copies of eight of the documents and announced that the originals had been passed to the Minister of Justice, Dullah Omar. The minister had not yet had time to study them, and he died in 2004 without having made any further comment on them. Attempts by Dr Williams and others to examine the originals failed to elicit them from the Ministry of Justice. A further search made by the Ministry at the request of Justice Goldstone on behalf of the Commission has been similarly unsuccessful.

12.38 The discovery of the SAIMR documents, together with their contents, is described in chapters 16, 17 and part of 18 of Dr Williams' book *Who Killed Hammarskjöld?* As she herself readily recognises, however, everything depends on whether the documents are genuine both in their provenance and in their content. As to their provenance, the Commission has been advised by the leading document examiner Robert Radley that it may be possible to draw inferences about the age of the paper and ink of the originals if they can be found, but that the photocopies which are all we presently have are of no assistance in these respects. As to their content, although they contain elements, discussed by Dr Williams, which can be doubted, there is nothing on the face of the documents which can be confidently shown to be false, either intrinsically or in relation to such facts as are independently known.

12.39 On the other hand, there is nothing in them which could not have been known to, or invented by, a forger. It follows that, even if these documents were in truth brought into being in 1961 (so that their provenance is genuine), this could have been done in order to advance a false claim to responsibility for the crash. Such a claim might have been made, for instance, by an organisation soliciting outsourced work from the South African National Intelligence Agency, which had a long record of assassinating opponents of the apartheid régime; though it should be borne in mind that the assassination of Chris Hani was not the work of the NIA, so that the file in which the SAIMR documents were found was not the most obvious place in which to file an assassin's prospectus.

12.40 We have considered whether a renewed effort to find the SAIMR documents should be made. Subject to the dating of the writing materials, verification (or rebuttal) of the suggestion that the CIA's director, Allen Dulles, had promised SAIMR the Agency's co-operation, and that it had possibly already provided SAIMR with information, might give a measure of credibility to the documents as secondary evidence of sabotage. We have mentioned in sections 10.7-8 above the CIA's apparent possession of information about a bomb placed in the plane. But it is doubtful whether a covert agency, even if it were to respond publicly, would be candid in what it said.

12.41 We give in section 15 our conclusions on the viability of these and other evidential materials. For the present we note that by themselves neither the SAIMR documents nor their contents can be treated as trustworthy.

13. Aerial attack or threat?

Eyewitnesses

13.1 Davison Nkonjera, a storeman at the African Ex-Servicemen's Club, about a mile from the airport, testified to the UN inquiry that he had seen an aircraft arrive from the north and circle the airport before flying away to the west. While it was circling, he said, the runway and control tower lights went off. He then heard two jets taking off in the dark in the same direction as the larger plane. He followed the planes on his motor scooter and saw a flash or flame from the jet on the right strike the larger plane. A similar account was given by the Club's watchman, M. K. Kazembe. Lemonson Mpinganjira, a charcoal burner, testified to the UN inquiry that he and a co-worker, Steven Chizanga, had seen two smaller planes following a larger one. As the larger one turned back towards Ndola the lower of the other two planes moved to a position above it. There was a red flash on the larger plane and a loud explosion followed by a series of smaller ones.

The Albertina*'s destination*

13.2 The first question raised by the aerial attack hypothesis is perhaps the most easily answered: how could it have been known that Ndola was the *Albertina*'s destination, when everything possible had been done by Captain Hallonquist and by the UN to conceal where the plane was heading?

13.3 The answer is painfully simple: Moise Tshombe and his advisers, mercenaries and their sponsors among them, had agreed that Ndola was to be the meeting place for peace talks with the UN, and the Rhodesian and British authorities had made elaborate arrangements to receive both parties there. Journalists were awaiting the DC6's arrival at the airport. It was an open secret, on which anybody planning an interception or an attack could count, that Ndola was the *Albertina*'s destination.

13.4 In addition to this, listeners will have been able to pick up Captain Hallonquist's transmissions first to Salisbury and then to Ndola about his position and expected time of arrival.

The radio log

13.5 The second large question is whether the official account of the dialogue between ground control and the *Albertina* is trustworthy. The dialogue quoted verbatim in section 6.3 above comes from a manuscript record said to have been prepared from notes of the radio dialogue jotted down by the air traffic controller, Arundel Campbell Martin, who was on duty that night at Ndola. Martin died in England in 2007 without, so far as the Commission knows, recording his account of the night in question; but in what follows we bear in mind that there will be people to whom his memory is important. Although our report records allegations touching on his role which we consider to merit further inquiry, we reiterate that the purposes of this report do not include the allocation of responsibility for the crash.

13.6 There ought to have been a running tape-recording of all the Ndola control tower's radio traffic. The Commission has, however, been unable to establish whether there was a tape-recorder in the tower which was either not working or not switched on; whether a recording was in fact made but deleted; or whether there was no tape-recorder at all. In a witness statement to the UN Commission, Colonel Maurice Barber (who had chaired the Rhodesian civil aviation inquiry and whose hostility to the UN is a matter of record) deposed that, despite long-term efforts to install one, there had been no tape-recorder at Ndola at the time of the crash. Other statements, however, suggest that the radio traffic had been recorded but deleted. The Commission is unable to say which version is true; but it does not consider that the manuscript note was a pure invention. Even though Captain Hallonquist, to avoid interception, had taken a circuitous route from Leopoldville and had maintained radio silence until the last possible moment, he could not land at Ndola without first making radio contact, and there is nothing in the reconstituted log which is inconsistent with this contact being made briefly and at the last minute. The dialogue, so far as it goes, has the ring of truth.

13.7 But there is evidence which casts doubt on its completeness.

13.8 Tore Meijer, a Swedish flying instructor with the Imperial Ethiopian Air Force, in 1994 described to a journalist how he was trying out a short-wave radio on the night of 17-18 September 1961. At about 2200 GMT (which was midnight at Ndola) he picked up dialogue in English which was clearly coming from an airport control tower and in which the name Ndola featured. As he later recalled it, the speaker said

> "He's approaching the airport. He's turning. He's levelling.
>
> Another plane is approaching from behind — what is that?"

13.9 Here, said Meijer, the transmission ended abruptly. He tried to report what he had heard, telling the head of the Ethiopian Air Force and Americans whom he knew, but without any apparent result. He also tried to get in touch with Bo Virving, Transair's chief engineer in Congo, again without success.

13.10 The indication that Martin's note may be incomplete is endorsed by the testimony given to the Rhodesian inquiries by the Salisbury air traffic controller, Leslie Thorogood, that, contrary to what the label on the transcript suggested, the radio/telephone traffic between Salisbury and Ndola on 3682 kc/s, which they had had to resort to because the regular frequency of 6915 kc/s was fading, had not been tape-recorded or therefore transcribed as it should have been. When Cecil Margo QC, counsel to the Rhodesian Commission of Inquiry, put to Thorogood that "this log is an attenuated document and that a good deal occurred which is not recorded on it", Thorogood replied: "That is correct."

13.11 In his memoirs, *Reflections on an Era: fifty years of mining in changing Africa* (1981), Sir Ronald Prain, the former chairman of the Rhodesian Selection Trust, a mining conglomerate, wrote of the DC6 crash:

> "Dag Hammarskjöld .... was killed in a plane crash in September 1961 while on a peace mission to see Tshombe. I remember the event well. I was staying at a guest house on the Copperbelt, relaxing on a Saturday evening, when one of our geologists called in to say that there was some unusual activity going on overhead. He was a radio 'ham' [amateur] and had been listening in to conversations between the control tower at Ndola airport and various units in

> the air and on the ground, from which he gathered that an aircraft had crashed somewhere nearby. He went off to organise a locate group of mining men to go out into the bush to try to locate the scene of the crash and to look for any survivors. The wreckage was eventually found a few miles from Ndola."

13.12 If this account is broadly accurate (and allowing for the fact that it was not a Saturday but a Sunday night on which the crash occurred), several things follow. First, the control tower log must be seriously deficient. Secondly, it had become apparent from the plane's transmissions that it was in trouble and about to crash. Third, the listener may also have picked up dialogue between the DC6 and other aircraft. Fourth, the formation of a search party may explain the otherwise sinister appearance of European men at the crash site shortly after the disaster (see sections 14.18-23 below).

13.13 The completeness of the log is also called in question by the account given by the Belgian pilot Beukels (see 13.44 below).

Fighter and other planes

13.14 If the *Albertina* was in radio contact with Ndola control tower from the time it sighted Ndola's lights (see section 6.3 above) a fighter waiting to attack it would have been able to identify its target with near-certainty.

13.15 Eighteen Canberra jet fighter-bombers of the Royal Rhodesian Air Force had been deployed to Ndola as part of the Federation's precautions against an overspill of the Katangan fighting. It was therefore feasible for one or more of them to take to the air if ordered to do so; but in spite of expressed suspicions, we have found no clear evidence that any of them became airborne that night.

13.16 The possibility that a Katangan Fouga Magister might have reached Ndola and attacked the DC6 was discounted by all three inquiries on the ground that the Fouga's range was limited by its fuel-carrying capacity to a distance less than that from Kolwezi (its base) to Ndola and back — a fact, if it was a fact, which does not allow for the possibility of refuelling *en route*. But the Commission has been advised by Sven Hammarberg and Professor Hansman that the Fouga manuals show its range to have been sufficient to allow it to fly from Kolwezi to Ndola on a combat mission, albeit with only a few minutes available for combat, and to return, albeit with only a marginal fuel supply remaining. This apart, if stationed not at Kolwezi but at Jadotville or Kipushi, or if able to refuel en route, a Fouga would have had no difficulty in reaching Ndola and returning.

13.17 David Doyle, who was in charge of the CIA's Elisabethville base until April 1961, has recorded in a memoir how, not long after the assassination of Patrice Lumumba in January 1961, he went to the airport at night to make what he described as a routine check-up, and found there a US-registered KC97 commercial Stratocruiser whose civilian crew were unloading three Fouga Magisters for delivery to Katanga "in direct violation," Doyle wrote "of US policy". The Fougas, although they were training planes, were armed.

13.18 Doyle expressed doubt in his memoir as to whether this was a CIA operation, since he himself had no forewarning of it. In June 2013 Charles Southall visited Doyle at his home in Honolulu. Doyle was by then frail, with patchy recollection, but he confirmed his account of the delivery of three Fouga Magisters. Asked by

Southall what was said in intelligence circles about the crash, Doyle replied that, after he had been posted to Burundi,

> "Tweedy came out after and wanted to know if I had any idea what had happened".

Bronson Tweedy was the head of the CIA's Africa division. If he had to ask Doyle such a question, the possibility of direct CIA involvement in interfering with the *Albertina*'s flight (as distinct from giving logistical support to Katanga) begins to recede (unless, conceivably, Tweedy was simply trying to find out how much Doyle knew).

13.19 It emerged in the course of the Rhodesian Commission of Inquiry that Katanga also possessed a number of De Havilland Dove aircraft. These were piston-powered twin-engine aircraft, one or more of which, according to Puren's memoirs, had been adapted for warfare by cutting a hatch through which bombs of a kind manufactured by Union Minière, detonated on release by a hand-grenade mechanism, could be dropped. At least one expert commentator, Bo Virving, noting that much of the evidence of a second aircraft (of which we have cited only a small proportion) appeared inconsistent with its being a jet, has surmised that one of the adapted Katangan Doves was the likely attacker, the effect of the bomb mechanism being such that an aerial explosion could send a larger plane off course even if it did not make a direct hit. This hypothesis is addressed in some detail by Dr Williams at pp. 183-6. The method is regarded by Sven Hammarberg as requiring "great skill combined with extreme foolhardiness", but not as impossible.

Radio monitoring

13.20 Also on the tarmac at Ndola on the night of 17 September were two USAF aircraft. Sir Brian Unwin's recollection, in his evidence to the Commission, was that one had come in from Pretoria and one from Leopoldville, where they were under the command of the respective US defence or air attachés. Of these aircraft he said:

> "Those planes we understood had high powered communication equipment and it did occur to us to wonder later, whether there had been any contact between one or other of the two United States planes with Hammarskjold's aircraft, as they had, we understood, the capability to communicate with Hammarskjold's plane.
>
> .....
>
> I do recall that when we saw these two planes on the ground we were ... saying 'Wonder what they're up to'."

13.21 Similar curiosity was recorded by Squadron Leader Mussell of the RRAF, who was reported to have told the UN inquiry that "American Dakotas were sitting on the airfield with their engines running." He surmised that they had been transmitting messages.

13.22 The US air attaché in Pretoria at the time was Don Gaylor, whose memoirs describe his functions as intelligence-gathering not only in South Africa but in other sub-Saharan states including Northern Rhodesia. Gaylor was ordered by the Pentagon to Ndola to meet the Secretary-General and (at least according to the memoirs) to provide him with any air transport he needed. This accounts for the

presence, though we doubt whether it accounts for the purpose, of at least one of the USAF planes parked at Ndola on the night of the crash.

The US National Security Agency intercept

13.23 In September 1961, Charles Southall was stationed at the US National Security Agency's naval communications facility in Cyprus. He is now retired with the rank of commander in the naval reserve, and is a commercial intelligence consultant. In 1961, a university graduate and a French-speaker, he was a naval pilot and an intelligence officer.

13.24 The National Security Agency (NSA), which was responsible for cryptological intelligence-gathering, maintained a listening-post near Nicosia in Cyprus from which it was able to monitor radio traffic, both oral and signal, over a large part of the globe. It occupied the upper floor of a building of which the CIA occupied the ground floor, although the two organisations did not exchange information. Southall's task was to read and if necessary decrypt intercepted messages and to pass them on to authorised users.

13.25 About 9 p.m. on 17 September 1961 Southall was telephoned at his home by the communications watch officer, who said "Get yourself out here tonight. Something interesting is going to happen." Southall drove to the listening facility where, shortly after midnight, a recording was played back to a group gathered over a loudspeaker. As Southall has consistently recalled it, a single male voice was heard over the sound of an aircraft engine saying in a voice Southall describes as 'cool and professional':

> "I see a transport plane coming low. All the lights are on. I'm going down to make a run on it. Yes, it's the Transair DC6. It's the plane."

13.26 There followed the sound of cannon-fire; then, in a more animated voice:

> "I've hit it. There are flames. It's going down. It's crashing."

13.27 Since Cyprus was on regular Eastern European time (it did not adopt Eastern European summer time until 1975), there will have been no time difference between Ndola and Nicosia. So a playback shortly after midnight in Nicosia was capable of encompassing the moment, at or just after 0010, when the *Albertina* went down, if, as Southall's narrative indicates, the event was expected and being awaited by the listening station.

13.28 Although Southall, when interviewed by the Chairman on behalf the Commission, was positive that the radio traffic he had listened to was consistent only with a deliberate shooting down, on the face of it the narrative he recounts is not inconsistent with an accidental shooting-down. This may be relevant to the account given by the Belgian pilot Beukels and considered in section 13.42ff. below; but we recognise that the manner and tone of the narrative which Southall heard play a legitimate part in the inference of intentionality which he drew and continues to draw, and which coheres with our own comment on Beukels in section 13.50 below.

13.29 Southall has repeated his account more than once over the intervening years, and it has been subjected more than once to critical scrutiny. For reasons to which we shall come in our concluding section, we think there may be a short answer to such critiques.

13.30 Also relevant to the Beukels account are two further facts. One is that Southall, who was fluent in French as well as English, says that the cockpit narrative may well have been in French. The other is that the body of the bilingual Haitian Serge Barrau was found in the cockpit of the *Albertina*. But against the possibility that Barrau was trying to interpret requests or commands given in French by Beukels or his radio operator, there appears to be no space in the dialogue recollected by Southall for communication by the attacker with the DC6.

Bullets

13.31 Accounts of apparent bullet holes in the remains of the crashed aircraft come from several sources. Wren Mast-Ingle (see section 14.20 below) has given an account of seeing the fuselage raked with what appeared to be bullet holes before the plane burnt out on the ground. The late Ian Waddicar, a British adviser on animal husbandry who was present at the crash site as a bystander, told his nephew Martin Ridler that the burnt-out fuselage had been "riddled with bullet-holes" which appeared to have been made by a machine-gun. But no such account was given by any of the officials who testified to the inquiries, and Errol Friedmann, a journalist who was covering the Ndola meeting for Associated Press, has described the crash site on 19 September in a statement to us:

> "The media representatives noted that there was no sign of bullet or cannon holes in any of the major sections of the aircraft that lay scattered around."

13.32 The remains of the aircraft were buried in a deep pit on the site of the airport. Excavation would appear to be the only way of verifying or falsifying these sharply discrepant accounts.

13.33 Separately from this, the post-mortem findings included bullets embedded in several of the bodies. A certain amount of attention has been devoted to these, but we do not consider that their origin can be shown to be other than the discharge, caused by intense heat, of ammunition rounds carried by UN security personnel. The ballistic evidence falls short of proof that occupants of the plane were shot once the aircraft was on the ground.

13.34 Who then could have partially disabled the plane in the air, if that is in reality what happened? Inevitably, more than one self-promoted candidate, and others besides, have emerged.

Deliberate attack?

13.35 The Commission has been provided by an American researcher, Lisa Pease, with a dossier of evidential material implicating by his own assertion a man named Bud Culligan. In 1974 Culligan, in gaol for cheque fraud and seeking to bring pressure to bear on the authorities for his release, wrote a long and detailed letter describing his career as an assassin for the CIA.

13.36 The letter included an account of a CIA-organised solo flight in a P38 aircraft bought the previous year in Texas and shipped to Tripoli where it was assembled and test-flown. Culligan claimed that he had then flown the plane to Ndola via Abidjan and Brazzaville, "shot the airplane, it crashed, and I flew back, the same way". Apart from a curiously remorseful remark ("The EA [executive action] involving Hammarskjold was a bad one. I did not want the job. Damn it, I

did not want the job"), Culligan's account contains no elaboration, making it impossible to test it against known facts.

13.37 Lisa Pease writes in her statement to the Commission:

> "You will see from the correspondence that Culligan's material was referred to an Attorney General, a Senator, and ultimately, the Senate investigation of the CIA's activities at home and abroad that became known as the Church Committee after its leader, Senator Frank Church. Clearly, others in high places had reasons to believe Culligan's assertions were worthy of further investigation."

13.38 Errol Friedmann, the AP journalist referred to in section 13.31 above, has given written evidence to this Commission about what happened during and after the proceedings of the Rhodesian Commission of Inquiry:

> "On or about the third day of the enquiry, [Cecil] Margo [QC, counsel to the inquiry] produced two "charcoal burners" who said that on the night of the crash, they had heard "more than one aircraft" in the vicinity of the crash area and one of the charcoal burners reported on a "flash of light" that had accompanied the sound of aircraft.
>
> The following day Margo introduced two Belgian pilots who he said were members of the embryonic Katanga Air force flying Fouga Magisters – a fairly small jet aircraft with wings in a v-shaped configuration and equipped with cannons and possibly rockets. Under examination both pilots were quite adamant that if they had been flying on the night of the crash they would have been in the vicinity of their home base at Kolwezi in Katanga. However they both seemed to recollect that they had not been flying at all.
>
> That night I returned to the Edinburgh Hotel where I was accommodated and joined a number of my press colleagues in the pub of the hotel. Later in the evening, people in the pub became quite noisy and I spotted the Belgian pilots at the bar counter. I went up to talk to them.
>
> In fairness and in parenthesis, I should say that both pilots seemed to have had a lot of beer and were quite boisterous. I remember quite clearly that one of the pilots claimed that they had "pulled the wool over the eyes of the commission" and they had in fact been flying on the night of the crash. The talkative pilot (whose name I cannot recall) claimed that they had been in contact with the Hammarsjold [*sic*] plane (a white-painted DC6) and that nearing Ndola he had "buzzed" the Hammarsjold plane. This forced the pilot to take evasive action.
>
> A second time he buzzed the plane by flying closely above its fuselage and forcing it down towards the ground. I remember asking him whether he had seen the plane actually crash, and his response was to laugh out loud."

13.39 Friedmann's note to a fellow journalist about this encounter came into the hands of counsel to the inquiry, who told him — quite properly — that he must testify about it to the commission. Friedmann was instructed by his news editor to do no such thing and to leave for Johannesburg, which he swiftly did.

13.40 We have remarked earlier in this report on the tendency of many mercenaries (not least when drinking) to confabulate. This may well take the form of placing the

narrator in a role of which he has learnt from others. But it does not necessarily mean that there is no truth whatever in the narrative.

13.41 The foregoing is not an exhaustive account of the claims and accusations made over time about a deliberate shooting down of the DC6, but it gives an idea of the difficulty of finding where the truth lies.

Accidental shooting down?

13.42 Dr Williams records the emergence in 1967 of a former Belgian pilot named Beukels with a claim to have accidentally shot down the *Albertina* in an attempt to divert it. He appears to have been reticent but was eventually brought by intermediaries to Paris to see a French diplomat with a UN background, Claude de Kemoularia, who in or about 1980 relayed Beukels' account to the UN diplomat George Ivan Smith. Dr Williams' immediate source is a transcription of what appears to be Smith's tape-recorded dictation of de Kemoularia's account. We do not know what de Kemoularia was using to refresh his memory of the 1967 conversation with Beukels, but the literary quality of the narrative suggests an editorial hand, probably that of one or both of the two intermediaries. In what follows we bear these caveats well in mind.

13.43 The testimony Beukels offered was in essence that a group representing a number of European political and business interests, fearing that Tshombe was about to capitulate or compromise, wanted the Secretary-General's plane diverted from Ndola to Kolwezi in order to persuade him of the case for Katanga's continued independence. To this end two Fougas, one of them piloted by Beukels and both armed with 7.5 mm machine guns in which every fifth round was a tracer bullet, were sent from Kolwezi to Ndola to await the Transair DC6. Each carried 990 litres of fuel with another 110 in reserve in wingtip tanks, giving them a minimum range of 1200 km. Both had radar and advanced radio equipment and carried two seats, the second for a radio operator. They were informed when the *Albertina* left Leopoldville and were given its position on three occasions when it broke radio silence. They derived further information from the Ndola radio tower (which could, as Dr Williams suggests, imply official complicity but by itself may mean no more than picking up the radio dialogue during the plane's approach).

13.44 Beukels' reported account of what happened next covers three pages of Dr Williams' book. It alleges a complicit act of the Ndola control tower in getting the DC6 to make a second circuit in order to enable the Fougas to get behind and above it — something which is not consistent with the spontaneous expression of surprise overheard by Meijer (see section 13.8 above).

13.45 Beukels goes on to recount climbing to meet the DC6's flight path:

> "At that moment the DC6, with all its lights, appeared. It was 0012. I whipped down in a dive.... At about 0013 we were 200 metres over the DC6, coming from behind. We were over the cabin of the plane immediately below and switched on powerful searchlights, which were underneath the fuselage. This shone a bright light down upon the cabin of the DC6."

The Fouga, said Beukels, then flew alongside the *Albertina*, and his radio operator called it with a message in French:

> " *'Appelle à DC6. Avisation* [sic] *atterrisage. Prière vous détourner sur base Kolwezi. Vous escortons. Importantes personnalités désirent rencontrer personnalité à bord. Si refus, avons ordre de vous contraindre par force. Si ok, répondez.'* ['Calling DC6. You are required to land. Please make for Kolwezi base. Important individuals want to meet individual on board. If you refuse, we have orders to use force. If you agree, acknowledge.']
>
> The pilot replied 'Wait, I will check.' Then he spoke to the tower. It should have been on the tape of the tower – that would be the normal procedure – but the tape, I know, was destroyed."

Getting no further reply, said Beukels, he fired what were intended to be warning shots, including tracer, across the DC6's path but must have hit the tail plane. He saw that the aircraft was unable to complete its turn. Beukels said he had panicked and lost his bearings, but his radio operator persuaded him to go back:

> "Then, at exactly 1215, the radio operator saw the DC6 burning on the ground..... I'm sure the tower at Ndola heard everything and knew everything."

Beukels was adamant that he had not known who was in the DC6 until he returned to base at Kolwezi, when he was heavily interrogated and feared for a time that he was going to be executed for shooting down the plane instead of diverting it.

13.46 With all the reservations which attend multiple hearsay of this kind, it is impossible not to be struck by the correspondence between those aspects of Beukels' reported narrative which we have picked out and independent testimonies which we have separately cited:

- the DC6 "with all its lights" — compare Southall's account of the overheard cockpit narrative (see section 13.25 above: "All the lights are on")
- the precise timing of the episode as between 0012 and 0015 — compare the times on the stopped watches of the victims (see section 7.5 above)
- the claimed fuel tank capacity of 990 litres — compare Hammarberg's calculation of 980 litres including the wingtip tanks, just enough to fly a combat mission from Kolwezi (see section 13.16 above)
- the use of a searchlight (see section 13.47)
- the use of French to order the plane to divert — compare Southall (see section 13.30 above) and the presence of the Haitian Barrau in the cockpit
- the account of a threatening approach rather than a surprise attack — compare Julien's reported account ("Turn back": see sections 12.12 and 12.15 above)
- the NSA's apparent foreknowledge of the event.

13.47 Margaret Ngulube, who has been interviewed by the Commission, was interviewed in 2011 by Jacob Phiri and Göran Björkdahl (with not wholly satisfactory translation) and spoke of "a very bright light" in the context of the approach of a second aircraft:

"*Were there other aircrafts that you saw in the sky apart from the one that had flames?*

There was another one that was ahead, just like a vehicle trafficking, it passed. Then was another one, this one had flames. Then there was another that flew past.

How far apart were these planes that you saw?

It wasn't hours, just minutes between the first and the other plane. And then was a very bright light, a very big light."

13.48 This testimony might have been considered equivocal were it not for the testimony given to the Board of Investigation by others. Assistant Inspector N. J. Vaughan, although he placed the time at 0140 to 0145, recounted that he had been driving on patrol between Nokambo and Mufulira when, some 200 yards from the latter, he saw a flash in the sky "like an electric light bulb which is switched on and immediately blows." It was, he said, a small bright white light which dimmed quickly and was followed by another, smaller, one vertically below it.

13.49 Timothy Kankasa, the township secretary, who had worked with aircraft during World War II and who after independence achieved distinction as a government minister and diplomat, described to the Board of Investigation and the Rhodesian Commission a large plane flying level but low in a north-westerly direction, and a second, unlit, plane close to and above it. His attention was attracted by an abnormal level of engine noise. The smaller plane, which flew first above and then alongside the larger one, shone a beam like a headlight on the larger plane. Although he thought the smaller aircraft was not a jet, and although he placed the event before 2300 hours, both the visual and the aural accounts describe features which were unpredictable but which correspond with Beukels' account. His widow, Mama Kankasa, in 2013 gave the Commission an account which corroborated her late husband's evidence but spoke of two planes which "flashed twice" on a larger plane and then returned towards the aerodrome. She placed the event between 10 and 11 at night.

13.50 Against all this must be placed the fact that there was little in Beukels' narrative, as reported, that could not have been ascertained from press coverage and the three inquiries, elaborated by his experience as a pilot. There are also elements of it which invite scepticism. We have mentioned in section 13.44 above the inconsistency between Beukels' claim that he was assisted by the control tower and the controller's expression of surprise which was overheard by Meijer. Another such element is the suggestion that the shadowy group of Europeans simply wanted to reason with Hammarskjöld: even if everything else was true, the intervention must at lowest have been a planned kidnapping with a view to holding him and his party hostage. Yet another is the assertion that the shooting down was an accident: it is no doubt possible that it was, and that the true intention was to frustrate the ceasefire negotiations by forcing the plane, as Lord Alport persistently put it, to "go elsewhere". But it is equally possible that Beukels was attempting, in describing his role, to exculpate himself from responsibility for sixteen intentional deaths — intentional either because he had in truth set out to shoot the DC6 down, or because he had done so, as he had threatened, when it failed to change course.

Culpability

13.51 It is not the Commission's role to allocate responsibility for the loss of the *Albertina*; its concern is with the possibility that a resumed or fresh official inquiry might be able to do so. Our provisional conclusion is that the evidence now available, in particular that of Southall and Beukels, may permit verification of the hypothesis that the plane was forced down by aerial harassment or gunfire. We shall elaborate this in our conclusions.

14. Official collusion?

Summary

14.1 Were officials of the Rhodesian Federation involved, either proactively or reactively, in the death of Dag Hammarskjöld? The question has been repeatedly asked and as often as not answered in the affirmative. We begin this section by explaining why we do not share this view.

14.2 The case for official collusion arises from the chaotic, contradictory, frequently inexplicable and in places irresponsible reaction (or lack of reaction) of the Federation authorities to the failure of the DC6 to land. In the remainder of this section we give a brief account of this lamentable history.

14.3 The Commission considers nevertheless that collusion cannot properly be deduced from such suspicion. The bizarre and inconsistent conduct of the authorities cannot be shown to be directed to any intelligible end, such as ensuring that the Secretary-General was dead, or (assuming that external force was known to have been used) that all evidence of how the plane came down was destroyed, or that those responsible for it were able to make their escape. It is more readily explicable by the insistence of Lord Alport, the High Commissioner, that the *Albertina* must have "gone elsewhere". This dismissive attitude, once disseminated, will have been enough to bring about a half-hearted and uncoordinated search, followed by aimless attendance at the crash site and even, appallingly, the prolonged neglect of the single badly burnt survivor, Harold Julien. We note that the United Nations Commission of Inquiry, though highly critical of the mindset underlying it, took the view that this was the unadmitted reason for the culpable delay.

14.4 There is a single allegation, so far entirely unproven, emanating from Beukels' reported account, that the Ndola control tower facilitated an aerial attack on the DC6 by requiring it to make a second circuit. If there is proof that individual officials colluded with an attack on the DC6, it has to be found in evidence which is more than inferential. We consider this in section 15.

The airport lights

14.5 More than one witness has spoken of the airport lights being turned off while the *Albertina* was awaited. In section 13.1 above we have recounted Davison Nkonjera's evidence to this effect. There is other testimony from local sources to similar effect.

14.6 We believe that any future inquiry will be sceptical, as we are, of this allegation, at least if it is taken to relate to the time of the *Albertina*'s arrival. To switch off the runway lights at night when an aircraft is known to be approaching is

a homicidal act. It could be done by throwing a single switch on the console in the control tower, but it would have been instantly observed by almost everyone present at the airfield, including diplomats, journalists and the many Africans waiting at the perimeter to show their support for the UN. Yet, so far as we know, no report of the extinguishing of the airport lights as the *Albertina* approached has come from any of these sources.

14.7 The single most convincing account that we have seen in relation to the lights was recorded in 1965 by the journalist Martha Paynter, who at about ten minutes past midnight saw an aircraft overfly the airfield and turn west but not return. "Long after midnight," she continued, "a tired airport official told us 'We don't expect another flight tonight. We are turning off our landing flares. You may all go home.'"

Discovery: the official account

14.8 The official account of the finding of the wreck has always been that, despite sending out spotter aircraft towards 1000 hours on 18 September, the Rhodesian authorities did not ascertain that the plane had crashed until its wreckage was sighted from the air shortly after 1500 hours on the afternoon of that day.

14.9 Part of this time lapse was accounted for by acknowledged but inexplicable delays early in the day. Although the airport manager, John 'Red' Williams, when informed at about 0330 by Marius van Wyk of the flash the latter had seen in the sky (see section 11.7 above), had undertaken to initiate a search at first light, and although air traffic control at Salisbury was expressing concern in its communications with Ndola as early as 0430, nothing was apparently done to initiate an air search when daylight came at about 0600. Instead, shortly after 0700 the Norwegian crew of a UN plane which had been diverted to Ndola to help with the search were placed under arrest. Finally at 0942 Salisbury control directed that the RRAF Canberras on the tarmac at Ndola should begin searching. But the search which began at about 1000 went north and south, when it was known that the *Albertina* would have been approaching the airstrip from the north-west or the west.

14.10 When finally at 1445 an RRAF pilot, Flying Officer Craxford, was sent in the obvious direction, he located the wreck within 25 minutes. It had thus allegedly taken 15 hours to locate from the air the burnt-out wreckage of a large aircraft at a place where both its predictable flight path and its last noted message indicated it might well have come down.

Discovery: the alternative account

14.11 What has fuelled the belief that the lapse of time was more than simply negligent is the weight of affirmative evidence that the wreck had in fact been located, not only by local people but by Federation officials, before or not long after dawn. A number of witnesses, some of them recently interviewed for the first time, have recounted how local people tried to reach the wreckage during the night and how next morning, not long after daybreak (i.e. around 6 a.m.), they found it. This was no more than was to be expected if in the hours of darkness they had seen something happen to an aircraft approaching Ndola airport over the forest.

14.12 In 1979 Timothy Kankasa told a Swedish researcher that, after seeing the plane crash into the bush, he had phoned the police, who did nothing. In the morning, charcoal burners had come to him to report that a plane had crashed and

was burning. At 9 or 9.30 a.m. he went to the site: "There was no police ... no army, no anybody until the afternoon." But at least one Zambian witness has recounted going to the crash site at dawn and being turned away by uniformed troops, and the journalist Ian Colvin saw something similar when he flew over the site during the morning (see section 14.16 below).

14.13 While fear of the authorities prevented a number of local people (in contrast to Timothy Kankasa) from reporting the wreck, the arrest during the morning of a local charcoal burner, L. Daka, and two others for stealing a cipher machine from the plane brought a police detachment to the site in advance of its location from the air. Ray Lowes, then a detective inspector, has described how, "shortly after lunch" on 18 September, following the arrest, he went in a Land Rover, with one of the accused as a guide, together with a civilian photographer named Nunn and three other officers, to the crash site. "There were bodies scattered throughout the site, mostly very badly damaged by fire," but Julien was found alive. Although he recalls reporting back to the police operations room, Lowes strangely does not recount summoning help for Julien, though his report may have included this. It is not known what happened to Nunn's photographs.

14.14 Sir Brian Unwin, then private secretary to Lord Alport, wrote to the *Guardian* newspaper in August 2011 recounting his role in the events. Part of his account was that he and Lord Alport, having snatched some sleep in a parked aircraft, had "returned to the airport buildings at dawn and heard that federal aircraft had sighted wreckage nearby". Interviewed by the Chairman on behalf of the Commission in December 2012, Sir Brian was clear that this was an error, and that it was not until the afternoon that he had learnt of the sighting.

14.15 His initial recollection, however, appears to have been shared by a former member of the Royal Rhodesian Air Force, Michael Saunders, who on 25 March 2012 posted on a Rhodesia-related internet site an account which includes this:

> "I write with some authority, I was there. I saw the aircraft overfly the airfield and turn downwind as I was at the airfield talking to the off duty controller. In the morning the search aircraft talked me to the crash site ...."

14.16 The readiness with which the crash site could be located once it was light is confirmed by an account published in 1968 by the Daily Telegraph's correspondent, Ian Colvin, a journalist close to Sir Roy Welensky. Colvin recounted that at 0900 on the morning of 18 September he had flown over the crash site in a chartered Cessna aircraft and had seen "police already moving about the clearing among the grey ash of the wreckage".

14.17 Col. Don Gaylor, the US air attaché in Pretoria who had been ordered to Ndola, recounts in his memoirs setting out in his own aircraft at "the crack of dawn" and eventually locating the crash site (not without difficulty, it should be said). He radioed the coordinates to the Ndola control tower.

> "We had been in the air for hours when a Rhodesian aircraft approached and circled the sight [*sic*]."

Was there in fact a rapid response?

14.18 The account given by Lemonson Mpinganjira and recounted in section 13.1 above continued in this way: having witnessed the aerial explosions, he and Steven

Chisanga took cover behind an anthill, from where, less than an hour later, they saw two Land Rovers driving very fast along the bush road in the direction of the aircraft. The vehicles were grey, not black (as police vehicles were), and because the interior lights were on it could be seen that the occupants were Europeans. There was a huge burst of flame, and the two vehicles then returned at high speed.

14.19 If (as has been speculated) mercenaries were swiftly at the scene of the crash and set fire to the wrecked plane, it might afford an explanation of the position in which local Africans found Dag Hammarskjöld's body at dawn, and of the pathologists' analysis of the autopsy findings (see section 8 above). It would mean, however, that the perpetrators had left a living eye-witness, Sgt. Julien, at the scene of their crime, making it necessary to speculate that, in the darkness, they did not realise Julien was there. If Mpinganjira's evidence stood alone, therefore, it might seem likelier that the flash he saw was the ignition of the plane's fuel, occurring on impact rather than (as he recalled it) only after others had sped to the scene; but it would still raise the question of how such a speedy response was possible without prior knowledge.

14.20 Mpinganjira's evidence, however, no longer stands alone. In January 2012, Wren Mast-Ingle, a South African, told Dr Susan Williams that in September 1961, when he was 22 years old and employed as a public relations officer for a Copperbelt mining company, he had been travelling by motor bike from Luanshya to Bancroft via Chingola, when he heard an aircraft, which he realised next day was the *Albertina*, come down in the forest nearby. His recollection was that this was around dusk, and in any event earlier than what is now known to have been the time of the crash. He made his way to the wreck, and from some 20 metres away was able to see a row of holes "the size of my fist" sweeping from below one wing on to the fuselage. There was no sign of a blaze. Within minutes two vehicles arrived. They were either Jeeps or Land Rovers, of a lighter colour than black, carrying between 6 and 8 armed white men, not in uniforms but in combat fatigues of some kind. They ordered him to leave.

14.21 In 2005 a former Katangan mercenary named Colin Cooper alleged to the Norwegian police that he had spent a week in Elisabethville with a South African mercenary named Swanepoel, a heavy drinker obsessed with weapons, who, in a drunken state, told him that he and three or four other men had been posted in the bush to wait for Hammarskjöld's plane. (Nonsensically, he also appears to have told Cooper that they were waiting for the plane to land, not to crash.) Swanepoel, according to Cooper's statement, went on to boast that he had shot and killed a bodyguard who had survived the crash. Pressed as to whether Swanepoel had admitted killing the Secretary-General, Cooper displayed great hesitation before suggesting that he had. Cooper had, however, as long ago as 1993, made a much less equivocal statement to a pilot named Helge Bjørlo, to the effect that, according to Swanepoel, the *Albertina* had been forced down and men had been posted in the forest to kill Hammarskjöld. Swanepoel, according to Cooper, had feared the UN (whose intelligence arm has records of interrogating and repatriating a mercenary of this name) and left Katanga shortly afterwards.

14.22 Neither of these narratives implicates Cooper himself in the alleged killings. But an account given by him to a former schoolfriend, Keith Osmond, at a school reunion in 1999, did so. Having told Osmond "You know the crash was staged", Cooper went on to assert that he and Swanepoel had been detailed to ensure that

Hammarskjöld had died in the crash. He told Osmond (whose testimony reached the Commission in August 2013) that they had reached the crash site in a Land Rover and found Hammarskjöld and two bodyguards still alive. Swanepoel had shot and killed Hammarskjöld; they had then killed the two bodyguards and riddled the wreckage with bullets.

14.23 If the plane's position as it approached Ndola had been monitored — and there is no doubt that it could have been — it is not impossible that persons waiting in the bush were able to reach the crash site rapidly. But it does not follow that Cooper was accurately relaying Swanepoel's account to the Norwegian police; or that, if he was, Swanepoel had been telling him the truth; or that Cooper was telling Osmond the truth about his own role. It is highly probable, for example, that the guard mentioned in the various accounts was Julien, who was not shot but died of burns. But even if Swanepoel or Cooper was relaying an account which he had heard and was giving himself a fictitious role in it, there is a measure of correspondence between it and the evidence given by uninvolved bystanders that men had arrived rapidly in Land Rovers following the crash. We have considered in sections 8.10 and 8.11 above how a measure of certainty might be reached in relation to these accounts.

14.24 What, however, casts some doubt on the likelihood that the crash was awaited by a detachment of mercenaries is the memoir quoted in section 13.11 above. If Prain's account is broadly correct, it may be that the men whom Mpinganjira observed and Mast-Ingle encountered were the search party assembled by the 'ham' who had picked up the radio traffic. But this account too has its oddity: if it was this search party which the two eye-witnesses encountered not long after the crash had happened, what did the search party then do? No record tells us.

15. Conclusions

The maze

15.1 We reiterate that the foregoing report, albeit detailed, contains no more than a selection from what is now a very large body of evidence, all of which we have considered in the course of our work. Much of it has become known only in recent years, and it is still capable of being added to — indeed it has been augmented during the writing of this report. This alone, without embarking on the limitations of the three original inquiries, answers the initial question: does significant new evidence about Dag Hammarskjöld's death exist? Undoubtedly it does.

15.2 The major question which follows is whether the extant evidence warrants the reopening of the UN's own inquiry. This is not a simple question. It has caused us in particular to consider whether there is any realistic prospect that a resumed or fresh inquiry could do more than continue to move the numerous pieces now on the chessboard, with little prospect of any outcome but a stalemate. If there were no other realistic prospect, our answer to the question posed in our remit, despite the importance and intrinsic interest of the material, would have to be 'No'. The maze of evidence would remain there for others to attempt to find their way through, but no outcome justifying the resumption of the official UN inquiry could be expected.

15.3 If, on the other hand, there were a golden thread in the maze, our answer would be 'Yes'. For reasons to which we now turn, we think this may be the case.

A golden thread?

15.4 There is persuasive evidence that the aircraft was subjected to some form of attack or threat as it circled to land at Ndola, which was by then widely known to be its destination. Accepting, as we do, that there is — as the experts advise — no need for such an explanation to account for the crash and that it is capable of being fully explained as a controlled flight into terrain, we nevertheless consider that the possibility that the plane was in fact forced into its descent by some form of hostile action is supported by sufficient evidence to merit further inquiry.

15.5 For reasons which we hope emerge from section 12, we do not consider that the sabotage claim is capable of verification, even though it leaves some tantalising questions unanswered. This is not the same thing as saying that it is untrue; only that there is in our judgment no present prospect of ascertaining whether it is true or not. Accordingly we do not recommend that the sabotage evidence be further investigated for the present by the United Nations, even though this may (we cannot know) mean closing the door on the facts.

15.6 The aerial attack claim, by contrast, whether it is considered to have caused the descent of the plane by direct damage or by harassment, or to have triggered some form of disabling harm to the plane, is in our judgment capable of proof or disproof.

15.7 Both from the specific evidence of a physical US presence at Ndola airport with radio monitoring equipment, and from the broader evidence of the US National Security Agency's worldwide monitoring activities in and about 1961, it is highly likely that the entirety of the local and regional Ndola radio traffic on the night of 17-18 September 1961 was tracked and recorded by the NSA, and possibly also by the CIA.

15.8 If the suggested attack or threat in reality occurred, the live cockpit narrative, whether in the form attributed by de Kemoularia to the pilot Beukels (section 13.45 above) or in the form of the recorded cockpit narrative recounted by Southall (sections 13.25-26 above), should in the ordinary course of events have been monitored, recorded (as indeed Southall testifies it had been), logged and archived by the US National Security Agency. It is likewise to be expected that any dialogue conducted by the Ndola control tower, and any messages or signals transmitted or received by the *Albertina*, were monitored and logged by the NSA.

15.9 Authenticated recordings of any such cockpit narrative or radio messages, if located, would furnish potentially conclusive evidence of what happened to the DC6. Thus, for example, if US records corroborate either or both of Beukels' and Southall's accounts, the inquiry will be close to an answer to the question of how those aboard the aircraft met their deaths, and some way towards allocating responsibility for it. Equally, however, if Beukels' reported account is pure fiction and Southall's recollection wholly mistaken, the eyewitness evidence alone still makes it appropriate to know what was overheard and recorded by the intensive surveillance of regional radio traffic which was undoubtedly maintained by US (and possibly other) security agencies on a night when it was known that the Secretary-General of the United Nations was flying to Ndola on a mission of international significance.

15.10 Thus any archived recording covering the last minutes of the *Albertina*, whether or not it corroborates a particular account or allegation, is likely to assist in

explaining why the aircraft crashed. If, by contrast, an otherwise comprehensive log or archive contains no such recording and can be established never to have contained it, it will go a long way to answer the claim that the plane was attacked or threatened from the air.

Next steps

15.11 Freedom of Information Act requests made by the National Security Archive at George Washington University, DC, on behalf of the Commission have accordingly included a request for

(a) Any recording or transcription of radio traffic intercepted or received by the US National Security Agency at its Cyprus station or any other station, on the night of 17-18 September 1961, appearing to relate to one aircraft firing upon another;

(b) Any radio message intercepted or received by the NSA between 2130 GMT on 17 September 1961 and 0030 GMT on 18 September 1961 concerning the landing or approach of an aircraft at Ndola, Northern Rhodesia.

15.12 The initial response of the US National Security Agency indicated that two out of three documents "responsive" to the Commission's request appeared to be exempt from disclosure by reason of "top secret" classification on national security grounds. (The status of the third, which is not held by the NSA, is still unknown.) On 19 July 2013 Dr Mary Curry, the Public Service Coordinator of the National Security Archive, wrote to the Commission:

> ".... please note that according to Dr John Prados, our expert on the CIA, National Security Agency intercepts have always been highly guarded by declassifiers. He said for the entire Cold War period there are only a few instances (some of Korea, some of Gulf of Tonkin, a few on Vietnam negotiations, some on the Six Day War) where we know messages have been released. Notwithstanding, we have filed Freedom of Information Act requests for the intercepts for the dates listed...."

An appeal against the continuing classification of these documents, which the Commission understands to be subject to a qualified 50-year rule, has been lodged.

The possibility of reopening the UN inquiry

15.13 This appears to the Commission an appropriate point at which to conclude its work.

15.14 The Commission respectfully considers that the United Nations, deploying authority which the Commission does not possess, would be justified in reopening its 1961-2 inquiry for the initial purpose of confirming or refuting, from intercept records, the evidence indicating that the descent of the Secretary-General's plane was brought about by some form of attack or threat. Such records appear, on the evidence currently available, to be held, if anywhere, in the United States. The Commission's investigations have reached a point at which this line of inquiry appears capable of producing a clear answer, and it is appropriate that the process should now pass into the hands of the General Assembly.

15.15 Whether any larger investigation is justified will then fall for decision depending on what, if anything, the proposed initial inquiry has revealed. If this

point is reached, we see no reason why it should not be feasible to restrict further investigation to what then appears realistic and relevant.

15.16 The Commission accordingly neither recommends nor anticipates the resumption of the UN inquiry at large. It would respectfully propose a focused and staged resumption, potentially concluding at the first stage but, if it continues, restricting itself to what will by then be identifiable as the key issues. What these may be are indicated in our report; but we recognise that events can confound predictions.

15.17 It is thus possible that the last half-century, far from obscuring the facts, may have brought us somewhat closer to the truth about an event of global significance which deserves the attention both of history and of justice.

The Hague, 9 September 2013

(Signed)
Stephen Sedley
Chairman

(Signed)	(Signed)	(Signed)
Hans Corell	**Richard Goldstone**	**Wilhelmina Thomassen**

APPENDIX 1

The Hammarskjöld Commission

Commissioners

THE RT. HON. SIR STEPHEN SEDLEY (CHAIR)

THE RT. HON. SIR STEPHEN SEDLEY (CHAIR) was called to the Bar in 1964, became a QC in 1983 and was appointed a High Court judge in 1992, serving in the Queen's Bench Division. He became a Lord Justice of Appeal in 1999, and has sat on the Judicial Committee of the Privy Council and as a judge ad hoc of the European Court of Human Rights. He retired from the bench in March 2011 and has since been a Visiting Professor of Law at Oxford University.

AMBASSADOR HANS CORELL

AMBASSADOR HANS CORELL was Under-Secretary-General for Legal Affairs and the Legal Counsel of the United Nations from March 1994 to March 2004. He was Ambassador and Under-Secretary for Legal and Consular Affairs in the Ministry for Foreign Affairs in Sweden from 1984 to 1994. From 1962 to 1984 he served in the Ministry of Justice and in the Swedish Judiciary, where he was appointed Judge of Appeal in 1980.

JUSTICE RICHARD GOLDSTONE

JUSTICE RICHARD GOLDSTONE served as a judge of the Constitutional Court of South Africa from July 1994 to October 2003. From 1991 to 1994 he served as the chairperson of the Commission of Inquiry Regarding Public Violence and Intimidation (the Goldstone Commission). He was the first Chief Prosecutor of the United Nations International Criminal Tribunals for the former Yugoslavia and Rwanda.

JUSTICE WILHELMINA THOMASSEN

JUSTICE WILHELMINA THOMASSEN served as a judge of the European Court of Human Rights in Strasbourg from 1998 to 2004 and as a judge of the Supreme Court of The Netherlands in the Court's criminal section from 2004 to 2012. Before that she practised at the Bar and has been a professor of international human rights law, a judge and vice-president of The Hague Regional Court and a justice and vice-president of The Hague Court of Appeal.

APPENDIX 2

The Hammarskjöld Inquiry Trust

Trustees

H.E. CHIEF EMEKA ANYAOKU G.C.V.O., C.O.N.

H.E. CHIEF EMEKA ANYAOKU joined his country's diplomatic service following Nigeria's independence and, in 1963, was posted to Nigeria's Permanent Mission to the UN in New York. He was elected Secretary-General of the Commonwealth in 1990, serving in this post until 1999. In 1991 he led Commonwealth leaders to agree the Harare Declaration which set out to give contemporary relevance to the Commonwealth's beliefs and purposes and to give it a new mandate, especially in relation to Apartheid. Currently, he is a Vice-President of the Royal Commonwealth Society.

ARCHBISHOP EMERITUS K. G. HAMMAR

ARCHBISHOP EMERITUS K. G. HAMMAR is a Doctor of Theology specialising in Hermeneutics. He was Dean of the cathedral in Lund and Bishop in the diocese of Lund before becoming the Archbishop of Uppsala, head of the Church of Sweden (1997 to 2006). He is now visiting professor emeritus at the Centre for Theology and Religious Studies, Lund University, Sweden.

LORD LEA OF CRONDALL (CHAIR)

LORD DAVID LEA was Assistant General Secretary of the UK Trades Union Congress 1979-99. He has been a member of the House of Lords since 1999 and Co-founder and Vice-Chairman of the All Party Parliamentary Group on Africa since 2002. He served as an election monitor in the Democratic Republic of the Congo in 2007.

LORD MARKS OF HENLEY-ON-THAMES Q.C.

LORD JONATHAN MARKS is a leading commercial and family barrister practising from Chambers in the Temple in London. Called to the Bar in 1975, he was made Queens Counsel in 1995. He is also a Liberal Democrat member of the House of Lords and is a party spokesman on Justice. His political specialisms are in human rights, justice and constitutional issues.

PROF. HENNING MELBER

PROFESSOR HENNING MELBER is Senior Adviser and Director Emeritus of the Dag Hammarskjöld Foundation in Uppsala, which he headed from 2006 to 2012. He was Senior Lecturer in International Relations at Kassel University (1982-1992), Director of the Namibian Economic Policy Research Unit in Windhoek (1992-2000) and Research Director of the Nordic Africa Institute in Uppsala (2000-2006). He is Extraordinary Professor at the University of Pretoria and Research Fellow at the Centre for Africa Studies of the University of the Free State in Bloemfontein.

PROF. NAISON NGOMA

PROFESSOR NAISON NGOMA is the Vice Chancellor of the Copperbelt University, Zambia, and former Director of its Dag Hammarskjöld Institute of Peace. Professor Ngoma has thirty years experience in management, nationally and internationally, at operational and strategic level in government, universities and international organisations including UN Agencies.

HANS KRISTIAN SIMENSEN

HANS KRISTIAN SIMENSEN is a freelance researcher based in Gothenburg, Sweden with experience in military and civilian aviation including air traffic surveillance and flight logistics. His father had served with the UN in the Congo and in 2006, Simensen started to collect documents from the Congo crises for a proposed digital "Dag Hammarskjöld Peace Broker Archive" for the Bibliotheca Alexandrina. Since 2009 he has been researching the Ndola accident.

DR SUSAN WILLIAMS

DR SUSAN WILLIAMS is a Senior Fellow at the Institute of Commonwealth Studies, School of Advanced Study, University of London. Her books include Who Killed Hammarskjöld? (Hurst 2011); Colour Bar. The Triumph of Seretse Khama and His Nation (Penguin 2006); The People's King. The True Story of the Abdication (Penguin 2003); The Iconography of Independence: 'Freedoms at Midnight' (Routledge 2009).

APPENDIX 3

Experts to the Hammarskjöld Commission

Ammunition/Ballistics

Major (Retired) Dan Perkins MEng, MIExpE

Former British Army Ammunition Technical Officer, Explosives Engineer, UK

Archives

Jean-Louis Moreau

Historian, Author with René Brion of De la Mine à Mars: la genèse d'Umicore (2006), Belgium

John Pinfold MA, DipLib

Former Librarian of the Bodleian Library of Commonwealth and African Studies at Rhodes House, University of Oxford, UK

Dr Kris Quanten Lieutenant-Colonel, General Staff, PhD

Military Professor, Director Chair of Military History, Royal Military Academy of Belgium

Prof. dr. Guy Vanthemsche PhD

Professor of Contemporary History at Free University Brussels, Secretary of the Royal Commission of History in Belgium

Prof. dr. Karel Velle PhD

National Archivist of Belgium, Associate Professor at the Department of History, Ghent University, President of EURBICA (European Branch of the International Council on Archives)

Aviation

Major (Retired) Sven E Hammarberg MSc, MBA

Consultant Aircraft Accident Investigator, Sweden

Dr R. John Hansman AB, SM, PhD

Professor of Aeronautics and Astronautics, Head of Division of Humans and Automation, Director of International Center for Air Transportation, Massachusetts Institute of Technology, USA

Forensic Pathology

Prof. Christer Busch Professor, MD, PhD

Consultant Pathologist at Department of Pathology, University Hospital, Uppsala, Sweden

Dr Deryk James MB ChB, DMJ(Path), MRC(Path), FRC(Path)

Senior Lecturer in Forensic Pathology, Wales Institute in Forensic Pathology, Cardiff University, UK

Prof. Lennart Rammer Professor, MD, PhD

Professor Emeritus of Forensic Medicine, University of Linköping, Sweden

Handwriting and Documents

Robert Radley MSc

Forensic Handwriting and Document Examiner, The Forensic Document Laboratory Limited, UK

APPENDIX 4

Witnesses who have submitted information directly to the Commission or who have been interviewed by or on behalf of the Commission during the course of the Commission's work.

1. Begg, Adrian (Australia)
2. Björkdahl, Göran (Sweden)
3. Care, Geoffrey (UK)
4. Chipoya, Custon (Zambia)
5. Doyle, David (USA)
6. Dunnett, Denzil (UK)
7. Friedmann, Errol (South Africa)
8. Kankasa, Mama (Zambia)
9. Kunda, Abraham (Zambia)
10. Lowes, Ray (UK)
11. Lowenthal, Mark (Israel)
12. Mast-Ingle, Wren (South Africa)
13. Merret, Christopher (South Africa)
14. Mulenga, Emma (Zambia)
15. Mulenga, Safeli (Zambia)
16. Ngongo, John (Zambia)
17. Ngulube, Margaret (Zambia)
18. Osmond, Keith (Kenya)
19. Pease, Lisa (USA)
20. Ridler, Martin (France)
21. Sanger, Clyde (Canada)
22. Southall, Charles (USA)
23. Svensson, Sixten (Sweden)
24. Thijssen, Mary (Netherlands)
25. Uddgren, Ingemar (Sweden)
26. Unwin, Brian (UK)
27. Wijnberg, Margaret (UK)
28. Williams, David (UK)

APPENDIX 5

Select Bibliography

Reports of previous inquiries into the crash of SE-BDY (in chronological order)

Federation of Rhodesia and Nyasaland , Department of Civil Aviation, *Report into the accident of 1961*, chaired by Colonel Maurice Barber, Federal Director of Civil Aviation, November 1961. Available online at:
http://www.hammarskjoldcommission.org/key-documents/

Federation of Rhodesia and Nyasaland, *Report of the Commission on the Accident Involving Aircraft SE-BDY*, chaired by Sir John Clayden, Chief Justice of the Federation, presented to the Federal Assembly, Salisbury, Federation of Rhodesia and Nyasaland, February 1962.
http://www.hammarskjoldcommission.org/key-documents/

United Nations General Assembly, *Report of the Commission of the Investigation into the Conditions and Circumstances Resulting in the Tragic Death of Mr Dag Hammarskjöld and of Members of the Party Accompanying Him*, chaired by Rishikesh Shaha, 24 April 1962. UN A/5069.
http://www.hammarskjoldcommission.org/key-documents/

United Nations General Assembly resolution 1759 (XVII) of 26 October 1962, requesting the Secretary-General to inform the General Assembly of any new evidence which may come to his attention.
http://www.hammarskjoldcommission.org/key-documents/

Rösiö, Bengt, 'The Ndola Disaster', Stockholm, Swedish Ministry for Foreign Affairs, November 1992.
http://www.hammarskjoldcommission.org/key-documents/

--, 'Comments to The Ndola Disaster', 1992.

--, 'The Ndola Disaster. Revised version', November 1992-February 1993.

--, 'Ndola Once Again', February 1994.

Publications

Alport, Lord, *The Sudden Assignment. Being a record of service in Central Africa during the last controversial years of the Federation of Rhodesia and Nyasaland 1961-1963* (London: Hodder & Stoughton, 1965).

Bengs, Bengt-Åke, 'The Ndola Accident. A theory as to the cause of the accident and facts not accounted for and not known to the public', 1966 [in a CIA file accessible through the Declassified Documents Reference System (DDRS)].

Björkdahl, Göran, and Phiri, Jacob, 'The Hammarskjöld Plane Crash', *International Peacekeeping*, Vol. 20, No.1, February 2013, pp.98-115. Published online: 11 Mar 2013 and available at:
http://www.tandfonline.com/doi/pdf/10.1080/13533312.2013.763681

Colvin, Ian, *The Rise and Fall of Moise Tshombe* (London: Leslie Frewin, 1968).

Fröhlich, Manuel, '"The Unknown Assignation": Dag Hammarskjöld in the Papers of George Ivan Smith', in *Beyond Diplomacy. Perspectives on Dag Hammarskjöld*

from the papers of George Ivan Smith and the Ezra Pound Case. Critical Currents No. 2 (Uppsala: Dag Hammarskjöld Foundation, 2008). Available online at: http://www.dhf.uu.se/pdffiler/cc2_web.pdf

Gavshon, Arthur L., *The Mysterious Death of Dag Hammarskjöld* (New York: Walker & Co., 1962; rpt with additional maps, etc., as *The Last Days of Dag Hammarskjöld*, New York: Barrie & Rockliff, 1963).

Gaylor, Colonel Don G., USAF (Ret.), *From Barnstorming to Bush Pilot* (Bloomington IL: iUniverse, Inc., 2010).

Hughes, Matthew, 'The Man Who Killed Hammarskjöld?' *London Review of Books* (9 August 2001), pp. 32-33.

Lesiovskij, Viktor Mecislavovic, *Tayina ghibeli Havmmarshelda*. [*The Mystery of Hammarskjold's Death*] (Moscow: Mysl', 1985).

Lesiovskij, Viktor Mečislavovič *Gåtan kring Dag Hammarskjölds död*. [*The Mystery of Hammarskjold's Death*] Translation by Gunnel Bergström, (Stockholm, Fram, 1989).

Lipsey, Roger, *Hammarskjöld. A Life* (Ann Arbor: The University of Michigan Press, 2013).

Möllerstedt, Gunnar, *Generalsekreteraren. En biografi om Dag Hammarskjöld* (Stockholm: Sveriges Radios Forlag, 1981).

Nævdal, Eodil Katarina, *Drømmenes palass. Trygve Lie og Dag Hammarskjöld, en beretning* (Oslo: Schibsted, 2000).

O'Brien, Conor Cruise, *To Katanga and Back. A UN Case History* (London: Hutchinson, 1962).

--, *Memoir: My Life and Themes* (London: Profile Books, 1998).

Prain, Ronald, *Reflections on an Era. Fifty years of Mining in Changing Africa. The autobiography of Sir Ronald Prain* (Letchworth: Metal Bulletin Books, 1981).

Puren, Jerry, Col., as told to Pottinger, Brian, *Mercenary Commander* (Alberton, South Africa: Galago, 1986).

Rembe, Rolf, and Hellberg, Anders, *Midnatt i Kongo: Dag Hammarskjölds förlorade seger* (Stockholm: Bokförlaget Atlantis, 2011).

Rösiö, Bengt, 'The Ndola Crash and the Death of Dag Hammarskjöld', *Journal of Modern African Studies*, 31, 1993, pp. 661-71.

--, *Ndola* ([Stockholm]: Nerenius & Santerus Forlag, 1997).

Trinquier, Roger, Duchemin, Jacques and Le Bailly, Jacques, *Notre Guerre au Katanga* (Paris: La Pensée Moderne, 1963).

Urquhart, Brian, *Hammarskjöld* (New York: Harper Colophon Books, 1972).

US Senate Select Committee to Study Governmental Operations with Respect to Intelligence Activities (The Church Committee), *Interim Report: Alleged Assassination Plots Involving Foreign Leaders* dated 20 November 1975, in particular Part III A. Congo.
http://www.aarclibrary.org/publib/church/reports/ir/pdf/ChurchIR_3A_Congo.pdf

--, *Final report of the Select Committee to Study Governmental Operations with Respect to Intelligence Activities* dated 26 April 1976.
http://archive.org/details/finalreportofsel01unit

Virving, Björn, *Termitstacken. Om olyckan där Dag Hammarskjöld omkom i Belgiska Kongo* (Stockholm: Forlag Termitem, 1996).

Williams, Susan, *Who Killed Hammarskjöld? The UN, the Cold War and White Supremacy in Africa.* (London: Hurst, 2011).

NOTE ON AMENDMENTS

Following the publication of this report on 9 September 2013, some factual errors and omissions were brought to the Commission's attention. None of these was the responsibility of the Commission's specialist advisers, and none affected the report's reasoning or conclusions. Sections 2.5-7, 5.1, 5.3, 5.7, 5.9, 11.1-2, 12.17, 13.47, 13.49 and 15.11-12 were amended on 15 September 2013.

It should be made clear in particular that the US National Security Agency is a part of central government, while the National Security Archive is an independent academic institution.

APPENDIX 6

Note on Time Zones

On 17th September 1961:

- **London** was operating on British Summer Time (BST) (GMT+1).
- **Ndola** and **Salisbury** were operating on Central Africa Time (CAT), which is the same all year round.
- **Addis Ababa** was operating on Eastern Africa Time (EAT), which is the same all year round.
- **Nicosia** was operating on Eastern European Time (EET), which was the same all year round until 1975, when daylight saving was introduced.

City	'Summer Time' Time zone (1961)	Time (from GMT 00:00)	'Winter Time' Time zone (1961)	Time (from GMT 00:00)
Nicosia	Easter European Time, no daylight saving (GMT+2)	02:00	Eastern European Time, no daylight saving (GMT+2)	02:00
Addis Ababa	Easter Africa Time, no daylight saving (GMT+3)	03:00	Easter Africa Time, no daylight saving (GMT+3)	03:00
Ndola	Central Africa Time, no daylight saving (GMT+2)	02:00	Central Africa Time, no daylight saving (GMT+2)	02:00
Salisbury (now Harare)	Central Africa Time, no daylight saving (GMT+2)	02:00	Central Africa Time, no daylight saving (GMT+2)	02:00

Implications of Time Zones for Noted Events on 17th September 1961

NB: In the absence of a contemporaneous record, column 5 reflects Campbell Martin's note

1	2	3	4	5	6	7
City	**'Summer Time' Time zone**	**Time (from GMT 00:00)**	**Albertina gave its ETA in GMT 22:20**	**Albertina reported overhead CAT 00:10**	**Southall heard recording – EET – shortly after 00:00**	**Meijer in Ethiopia, heard Ndola flight control conversation GMT 22:00**
Ndola	Central Africa Time (GMT+2)	02:00	00:20	00:10	Shortly after 00:00	00:00
Nicosia	Eastern European Time (GMT+2)	02:00	00:20	00:10	Shortly after 00:00	00:00

Addis Ababa	**Eastern Africa Time (GMT+3)**	03:00	01:20	01:10	Shortly after 01:00	01:00
Salisbury (now Harare)	**Central Africa Time (GMT+2)**	02:00	00:20	00:10	Shortly after 00:00	00:00